

This Page Is Inserted by IFW Operations
and is not a part of the Official Record

BEST AVAILABLE IMAGES

Defective images within this document are accurate representations of the original documents submitted by the applicant.

Defects in the images may include (but are not limited to):

- BLACK BORDERS
- TEXT CUT OFF AT TOP, BOTTOM OR SIDES
- FADED TEXT
- ILLEGIBLE TEXT
- SKEWED/SLANTED IMAGES
- COLORED PHOTOS
- BLACK OR VERY BLACK AND WHITE DARK PHOTOS
- GRAY SCALE DOCUMENTS

IMAGES ARE BEST AVAILABLE COPY.

**As rescanning documents *will not* correct images,
please do not report the images to the
Image Problem Mailbox.**

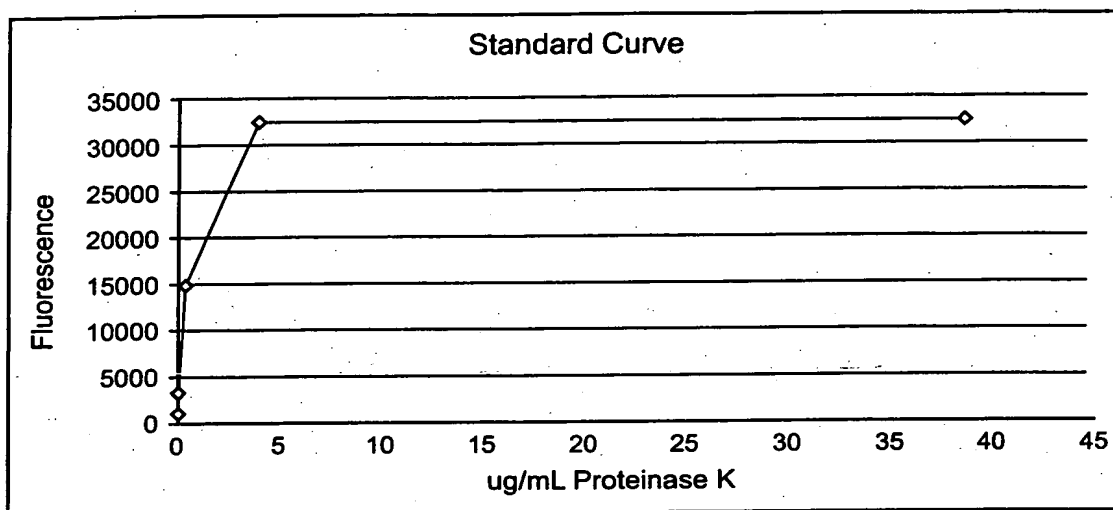


Figure 1

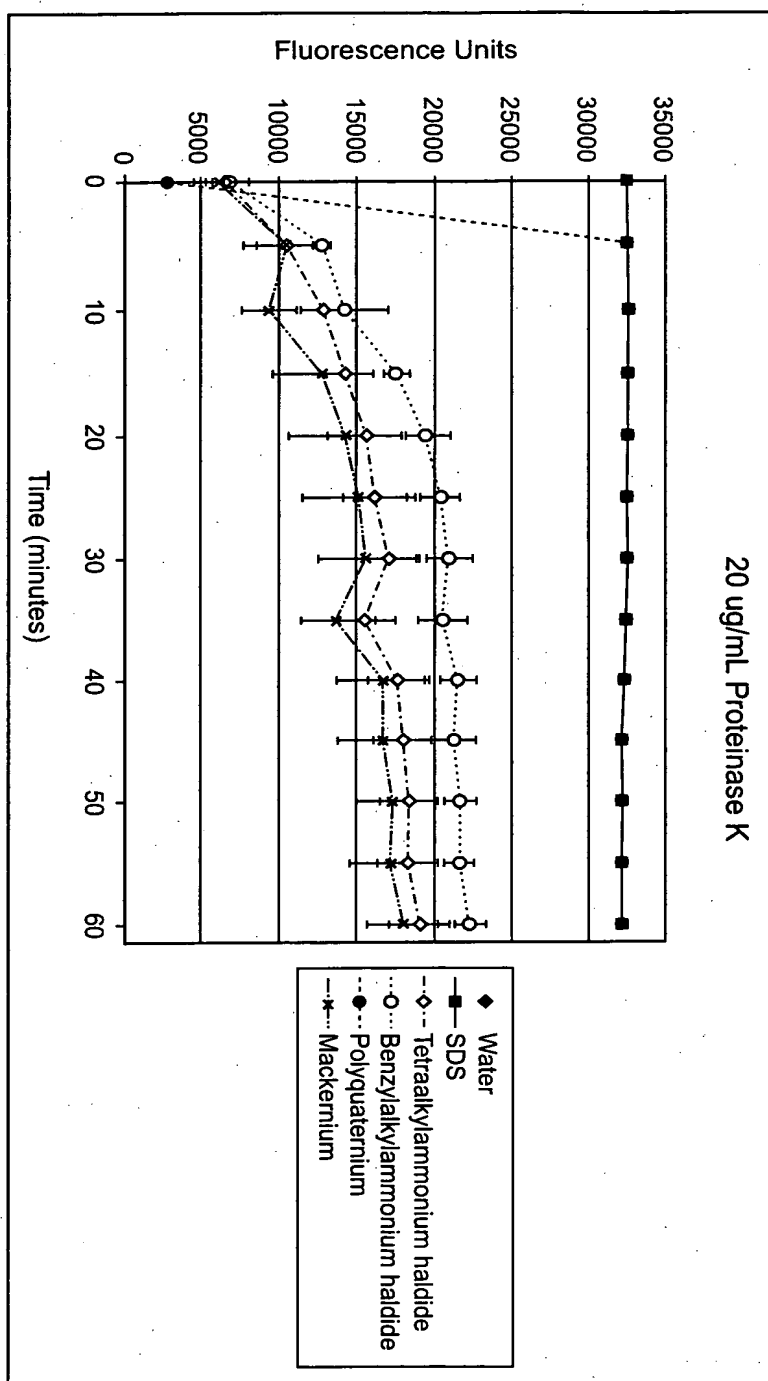


Figure 2A

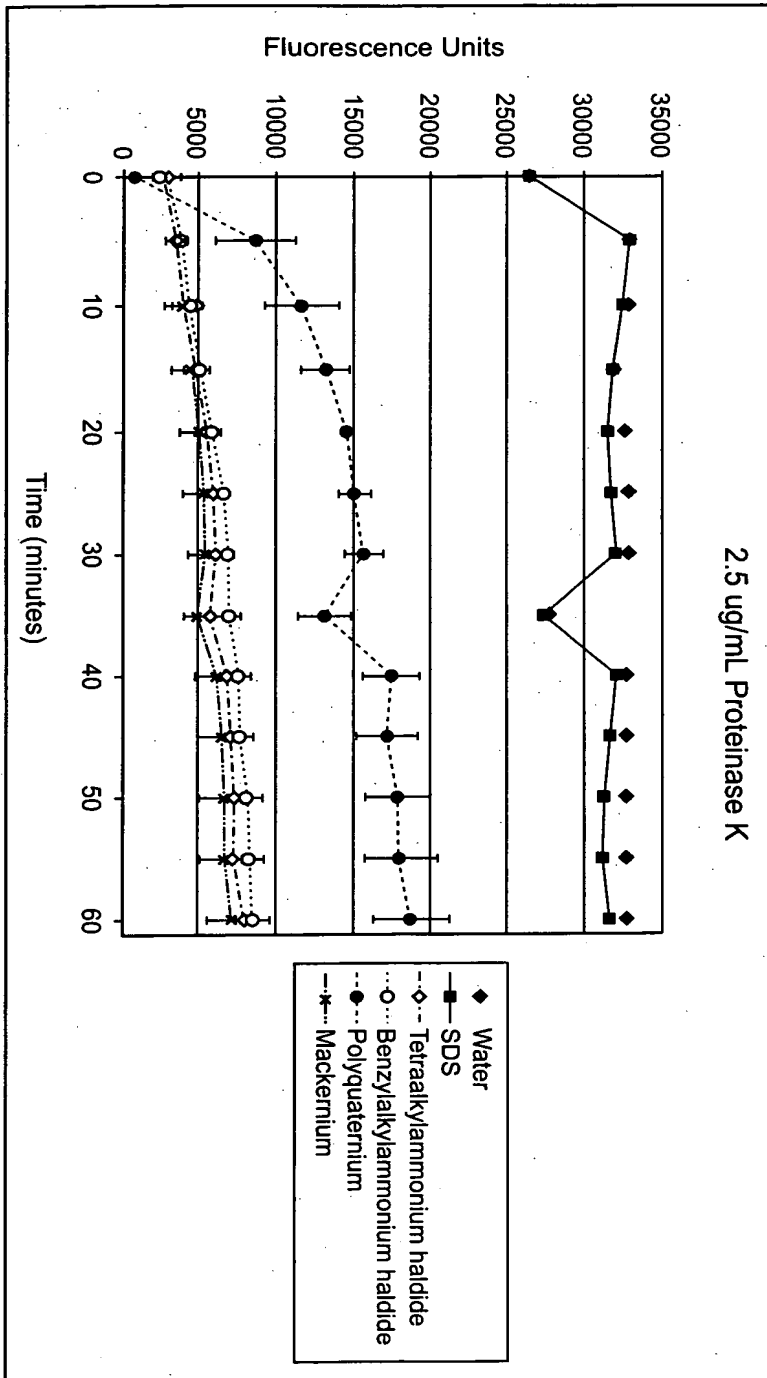


Figure 2B

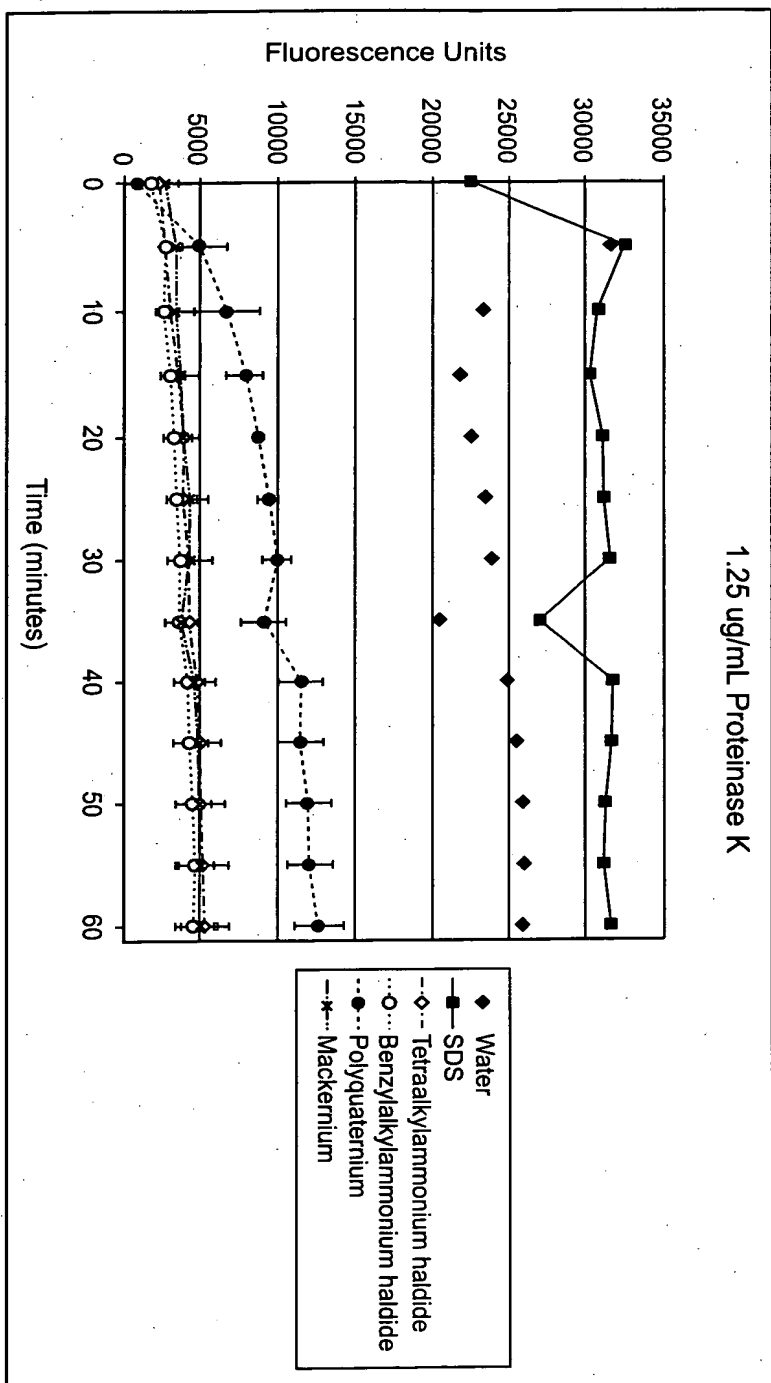


Figure 2C

Amount nucleic acid recovered from liver

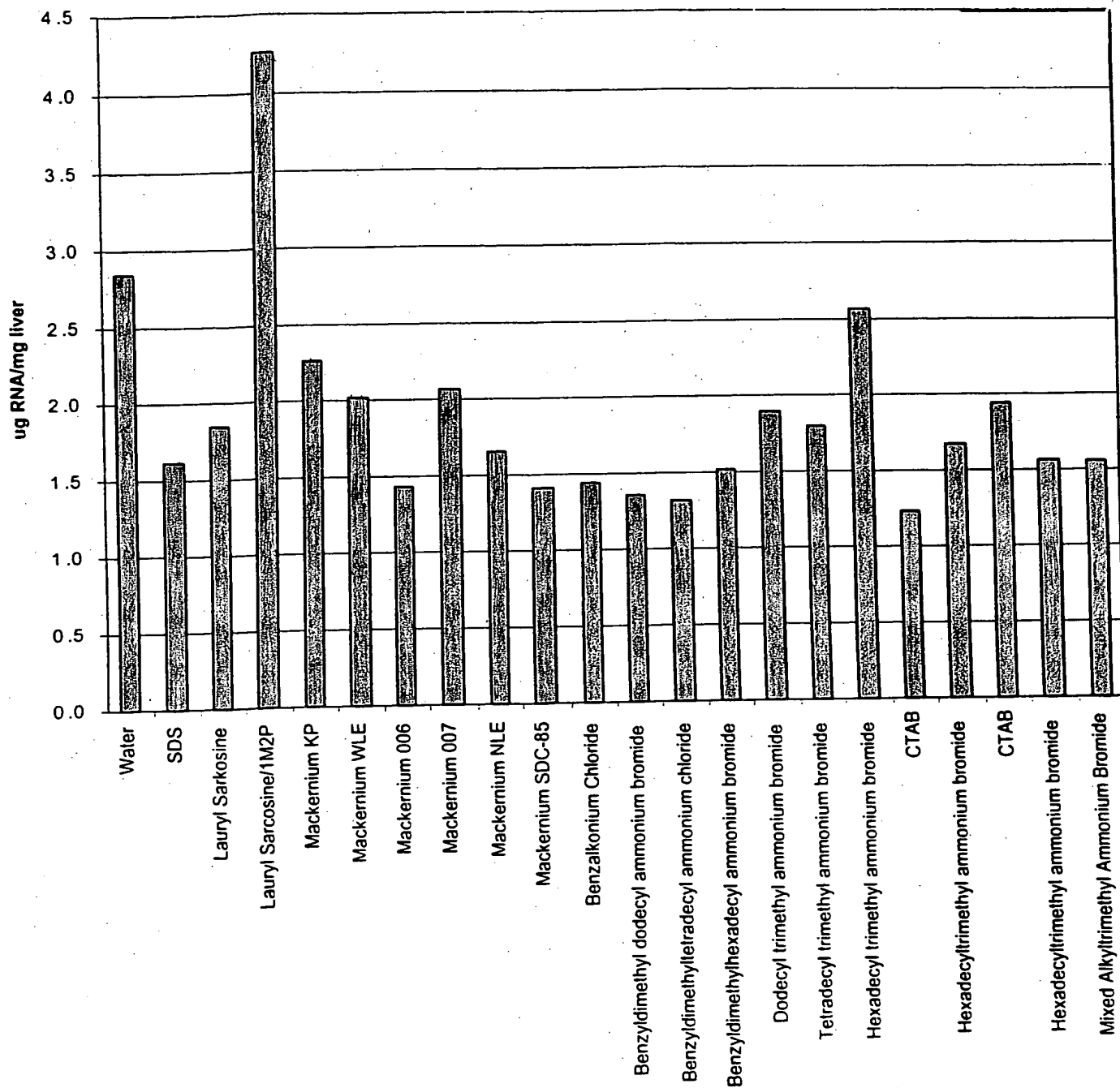


Figure 3

1 KB standard
RNA Ladder
Control RNA
Sup: Water
Sup: SDS
Sup: Mackemium KP
Sup: Mackemium WLE
Sup: Benzaloniun Chloride
Sup: Mackemium 006
Sup: Mackemium 007
Sup: Mackemium NLE
Sup: Dodecyl trimethyl ammonium bromide
Sup: Tetradecyl trimethyl ammonium bromide
Sup: Hexadecyl trimethyl ammonium bromide
Sup: CTAB
Sup: Mackemium SDC-85
Sup: Mixed Alkyl trimethyl ammonium bromide (C ₁₂)
Sup: Benzyl dimethyl ammonium bromide
Sup: Benzyl dimethyl hexadecyl ammonium chloride
Sup: Benzyl dimethyl tetradecyl ammonium chloride

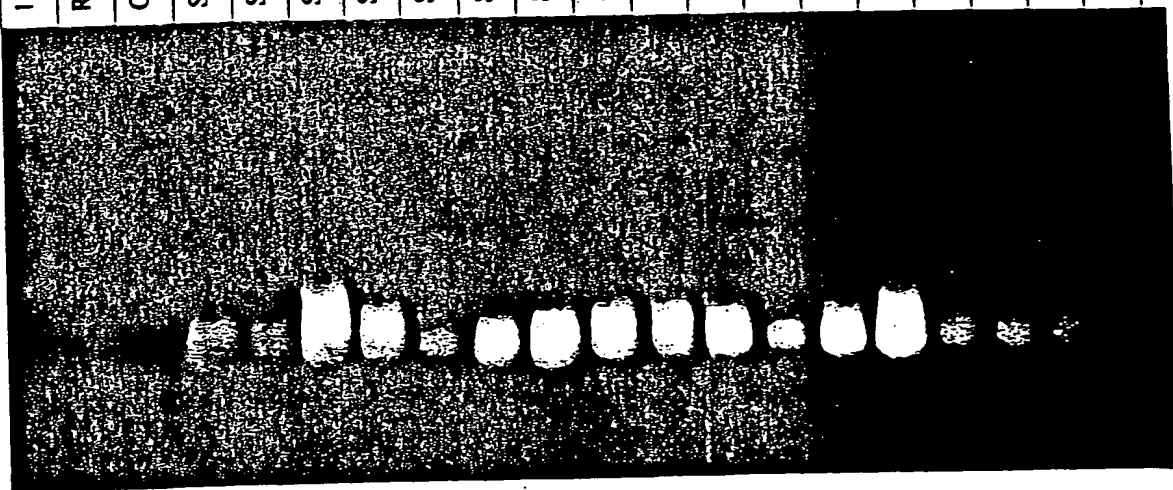


Figure 4A

Supel: Hexadecyl trimethyl ammonium bromide
Supel: CTAB
Supel: Hexadecyl trimethyl ammonium bromide
Supel: Lauryl sarcosine
Supel: Lauryl sarcosine/1-methyl 2-pyrrolidone
Pellet: Water
Pellet: SDS
Pellet: Mackernium KP
Pellet: Mackernium WLE
Pellet: Benzaloniun Chloride
Pellet: Mackernium 006
Pellet: Mackernium 007
Pellet: Mackernium NLE
Pellet: Dodecyl trimethyl ammonium bromide
Pellet: Tetradecyl trimethyl ammonium bromide
Pellet: Hexadecyl trimethyl ammonium bromide
Pellet: CTAB
1 KB standard
RNA Ladder
Control RNA

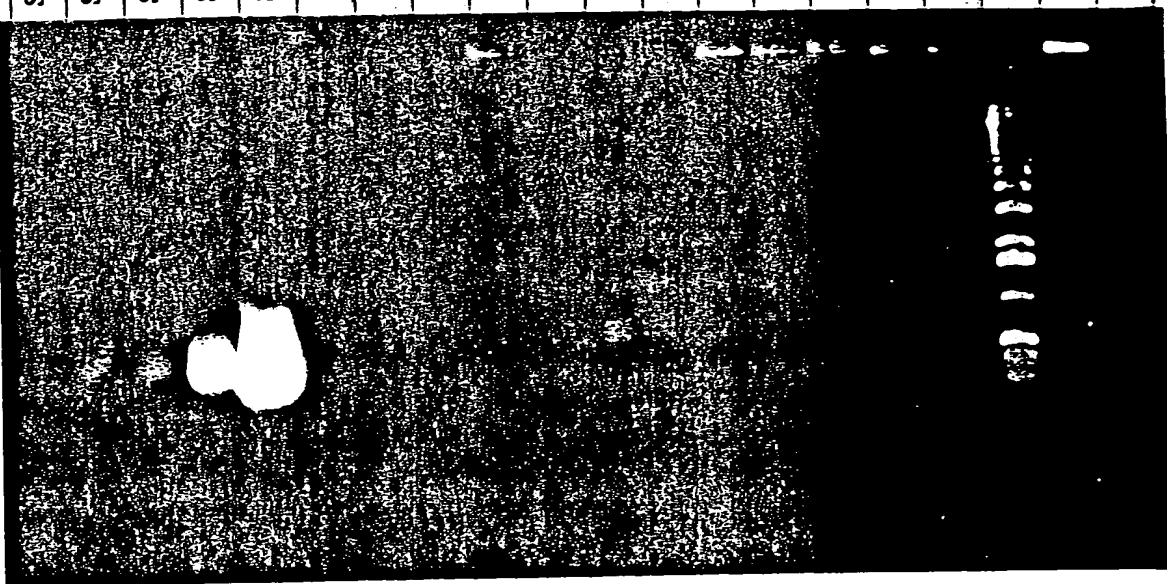


Figure 4B

Amount nucleic acid released from liver
 2 mg/mL Proteinase K 45°C 20 minutes plus

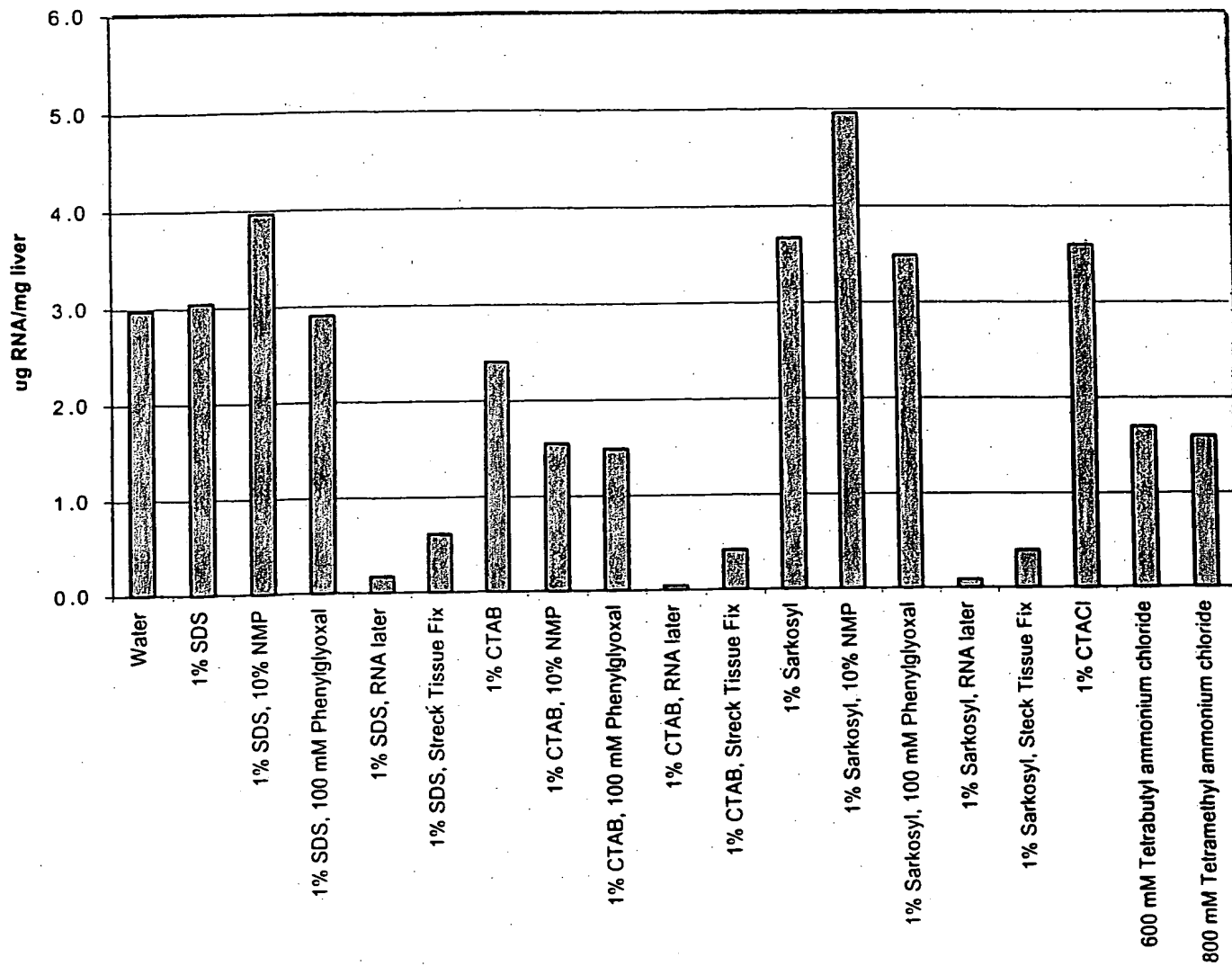


Figure 5

1KB DNA Standard	
RNA Ladder	
Human RNA control	
	No detergent
	1% SDS
10% 1 Methyl 2-pyrrolidinone	1% SDS
100 mM phenylglyoxal	1% SDS
RNA Later	1% SDS
Streck Tissue Fixative	1% SDS
	1% CTAB
10% 1 Methyl 2-pyrrolidinone	1% CTAB
100 mM phenylglyoxal	1% CTAB
RNA Later	1% CTAB
Streck Tissue Fixative	1% CTAB
	1% Sarkosyl
10% 1 Methyl 2-pyrrolidinone	1% Sarkosyl
100 mM phenylglyoxal	1% Sarkosyl
RNA Later	1% Sarkosyl
Streck Tissue Fixative	1% Sarkosyl
	1% CTACl
600 mM tetrabutyl ammonium	No detergent
800 mM tetramethyl	No detergent

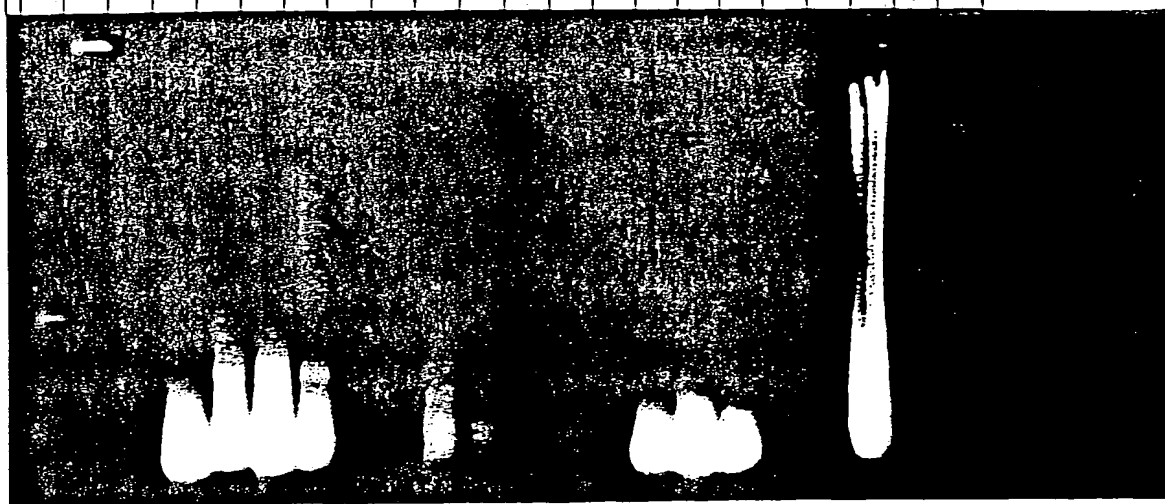


Figure 6

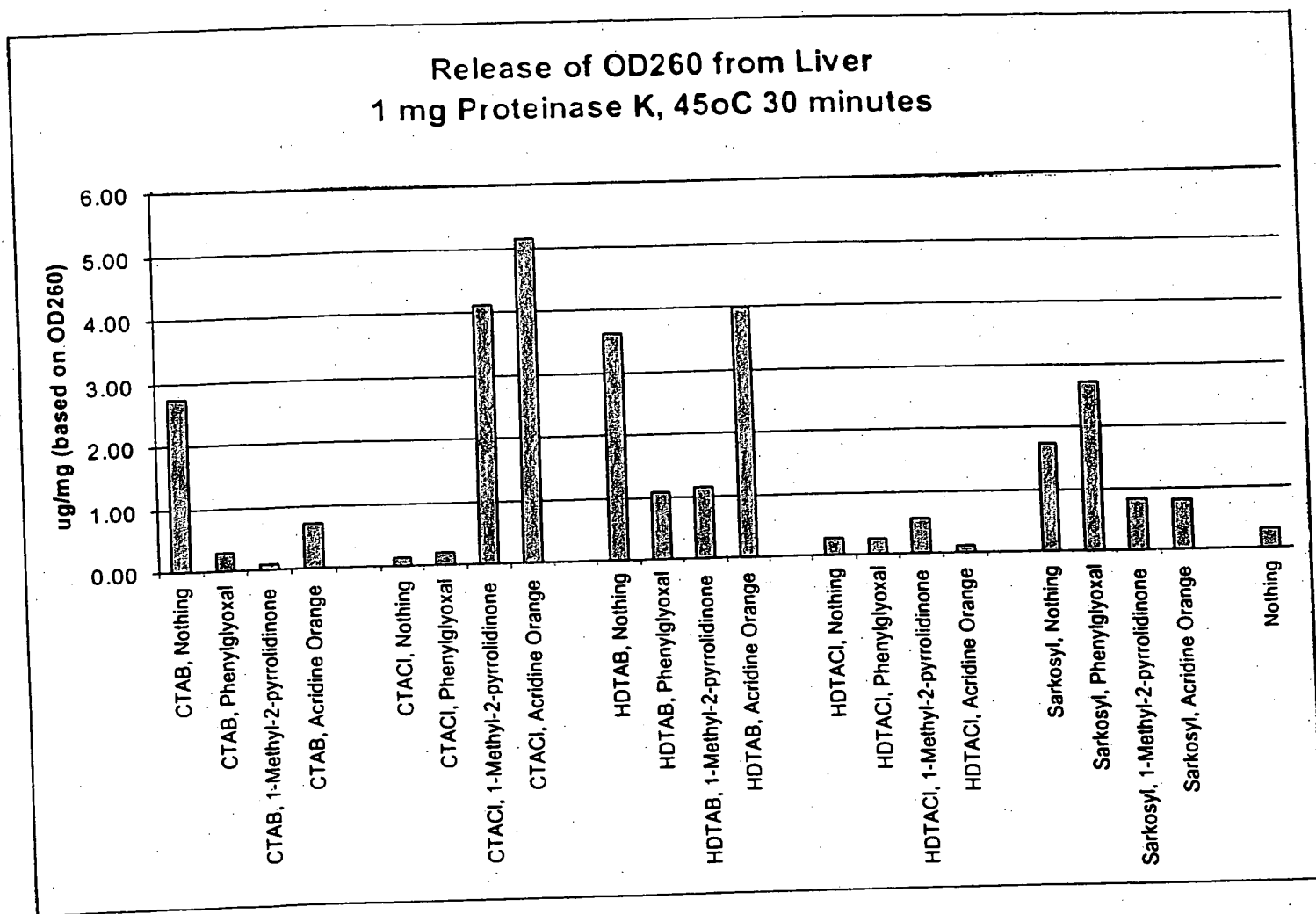


Figure 7

None	Cetyltrimethylammonium bromide
phenylglyoxal	Cetyltrimethylammonium bromide
1-methyl-2-pyrrolidinone	Cetyltrimethylammonium bromide
Acridine Orange	Cetyltrimethylammonium bromide
None	Cetyltrimethylammonium chloride
phenylglyoxal	Cetyltrimethylammonium chloride
1-methyl-2-pyrrolidinone	Cetyltrimethylammonium chloride
Acridine Orange	Cetyltrimethylammonium chloride
None	Hexadecyltrimethylammonium bromide
phenylglyoxal	Hexadecyltrimethylammonium bromide
1-methyl-2-pyrrolidinone	Hexadecyltrimethylammonium bromide
Acridine Orange	Hexadecyltrimethylammonium bromide
None	Hexadecyltrimethylammonium chloride
phenylglyoxal	Hexadecyltrimethylammonium chloride
1-methyl-2-pyrrolidinone	Hexadecyltrimethylammonium chloride
Acridine Orange	Hexadecyltrimethylammonium chloride
None	Sarkosyl
phenylglyoxal	Sarkosyl
1-methyl-2-pyrrolidinone	Sarkosyl
Acridine Orange	Sarkosyl
	No detergent

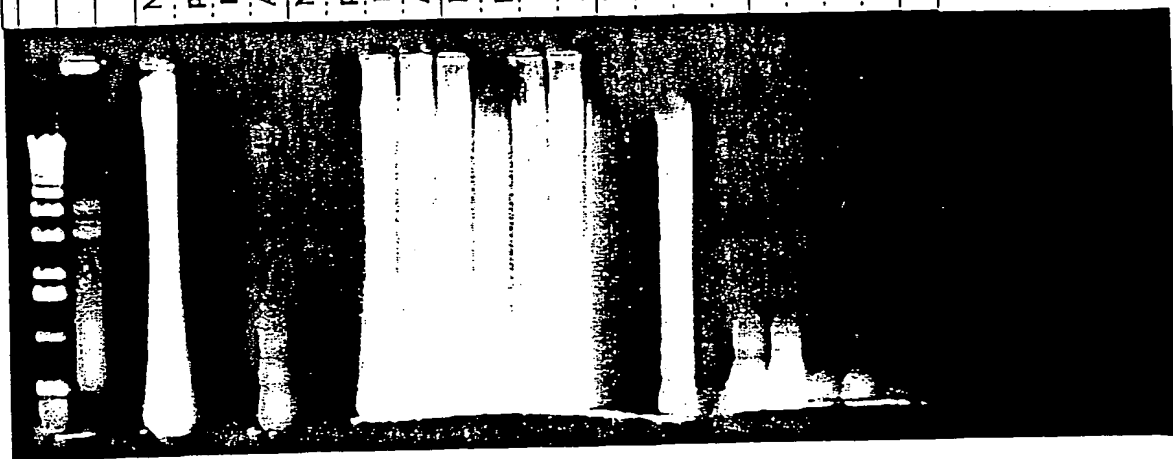


Figure 8

Effect of Tissue Presoaking
1 mg Proteinase K, 45°C 30 minutes

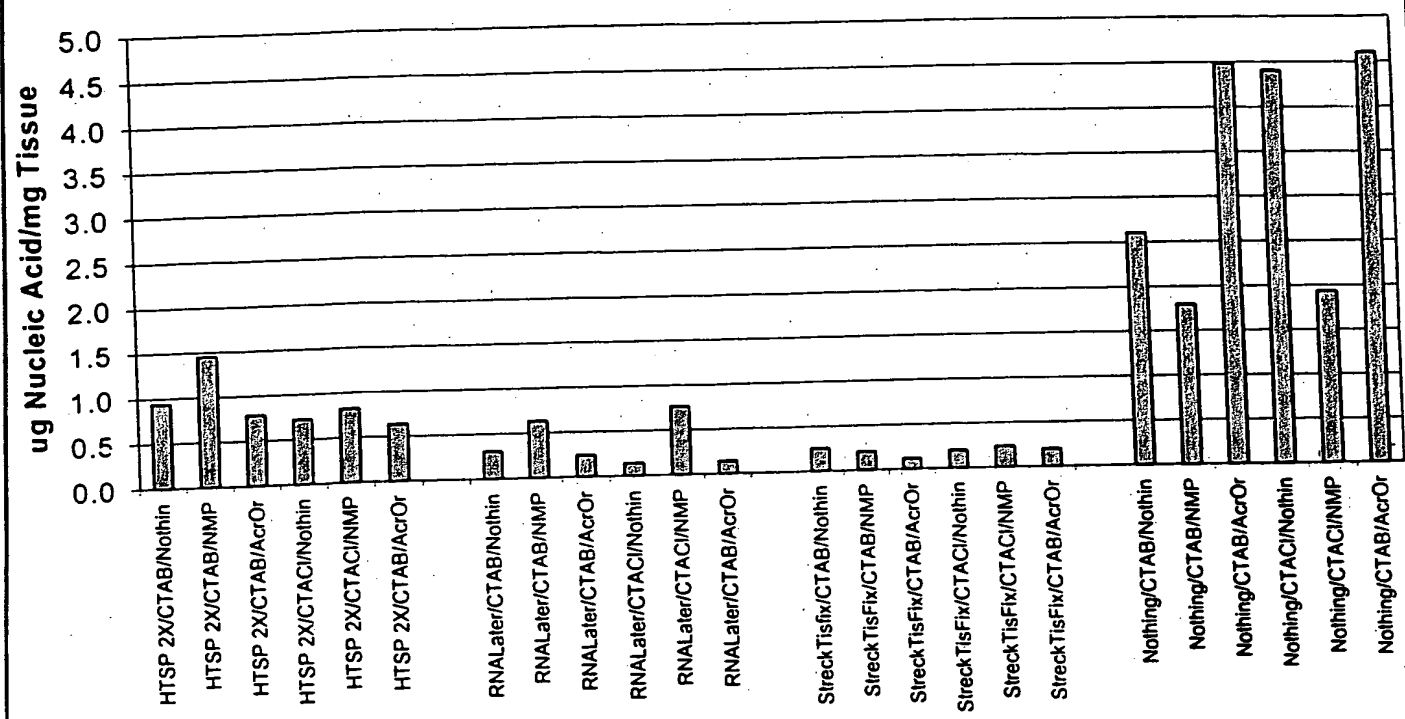


Figure 9



2XHTSP			RNA Later		Streck Tissue Fixat		Nothing	
CTAB	CTACI		CTAB	CTACI	CTAB	CTACI	CTAB	CTACI
Nothing								
1-methyl-2-pyrrolidinone								
Acridine Orange								
Nothing								
1-methyl-2-pyrrolidinone								
Acridine Orange								
Nothing								
1-methyl-2-pyrrolidinone								
Acridine Orange								
Nothing								
1-methyl-2-pyrrolidinone								
Acridine Orange								
Nothing								
1-methyl-2-pyrrolidinone								
Acridine Orange								
Nothing								
1-methyl-2-pyrrolidinone								
Acridine Orange								
Nothing								
1-methyl-2-pyrrolidinone								
Acridine Orange								

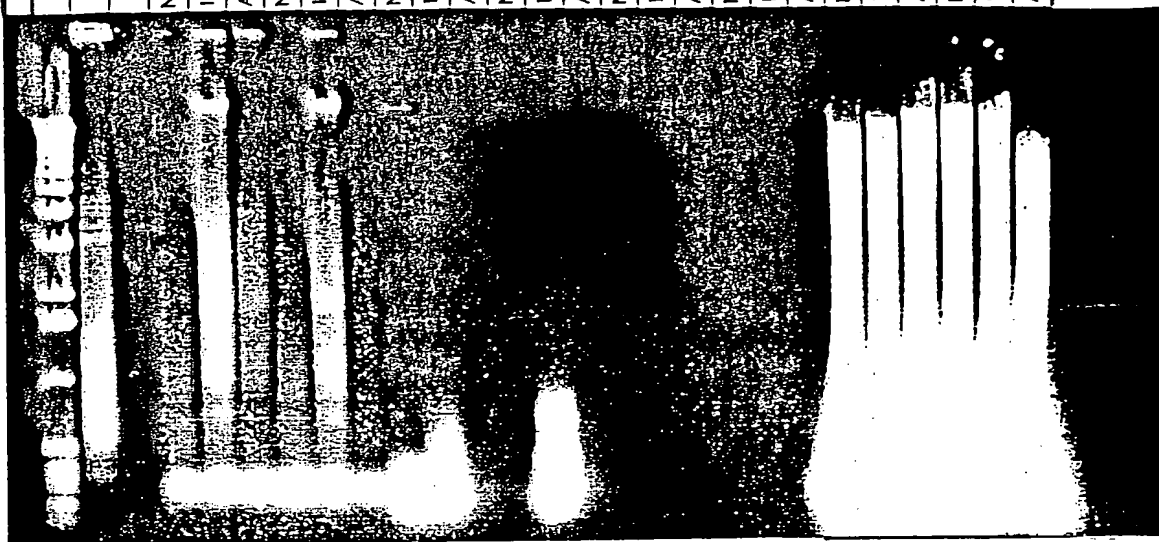


Figure 10

1% CTAB						1% CTACl						1% SDS					
5 mM Aurintricarboxylic Acid						5 mM Aurintricarboxylic Acid						5 mM Aurintricarboxylic Acid					
2 mM Aurintricarboxylic Acid						2 mM Aurintricarboxylic Acid						2 mM Aurintricarboxylic Acid					
1 mM Aurintricarboxylic Acid						1 mM Aurintricarboxylic Acid						1 mM Aurintricarboxylic Acid					
0.5 mM Aurintricarboxylic Acid						0.5 mM Aurintricarboxylic Acid						0.5 mM Aurintricarboxylic Acid					
0.2 mM Aurintricarboxylic Acid						0.2 mM Aurintricarboxylic Acid						0.2 mM Aurintricarboxylic Acid					
0.1 mM Aurintricarboxylic Acid						0.1 mM Aurintricarboxylic Acid						0.1 mM Aurintricarboxylic Acid					

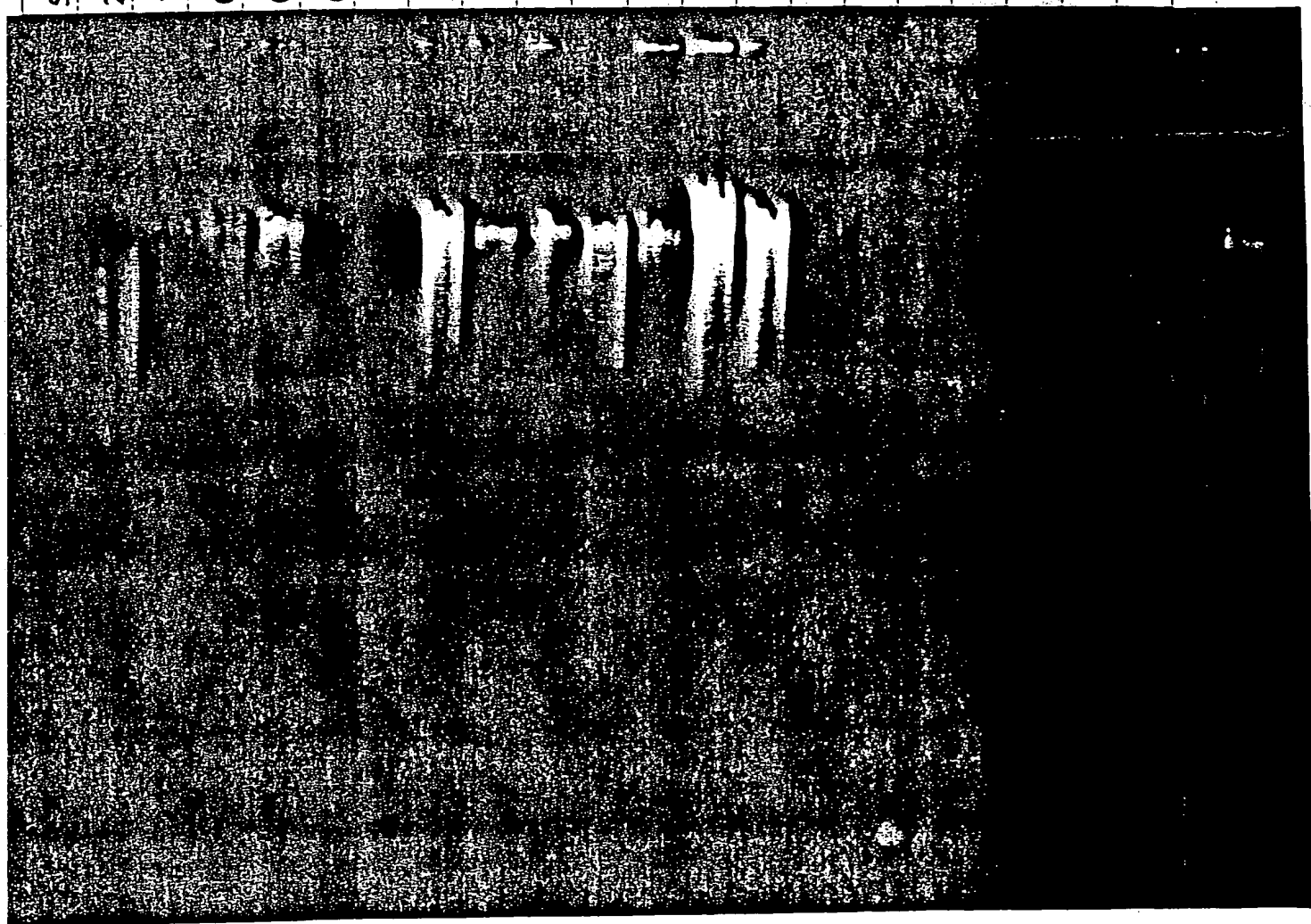
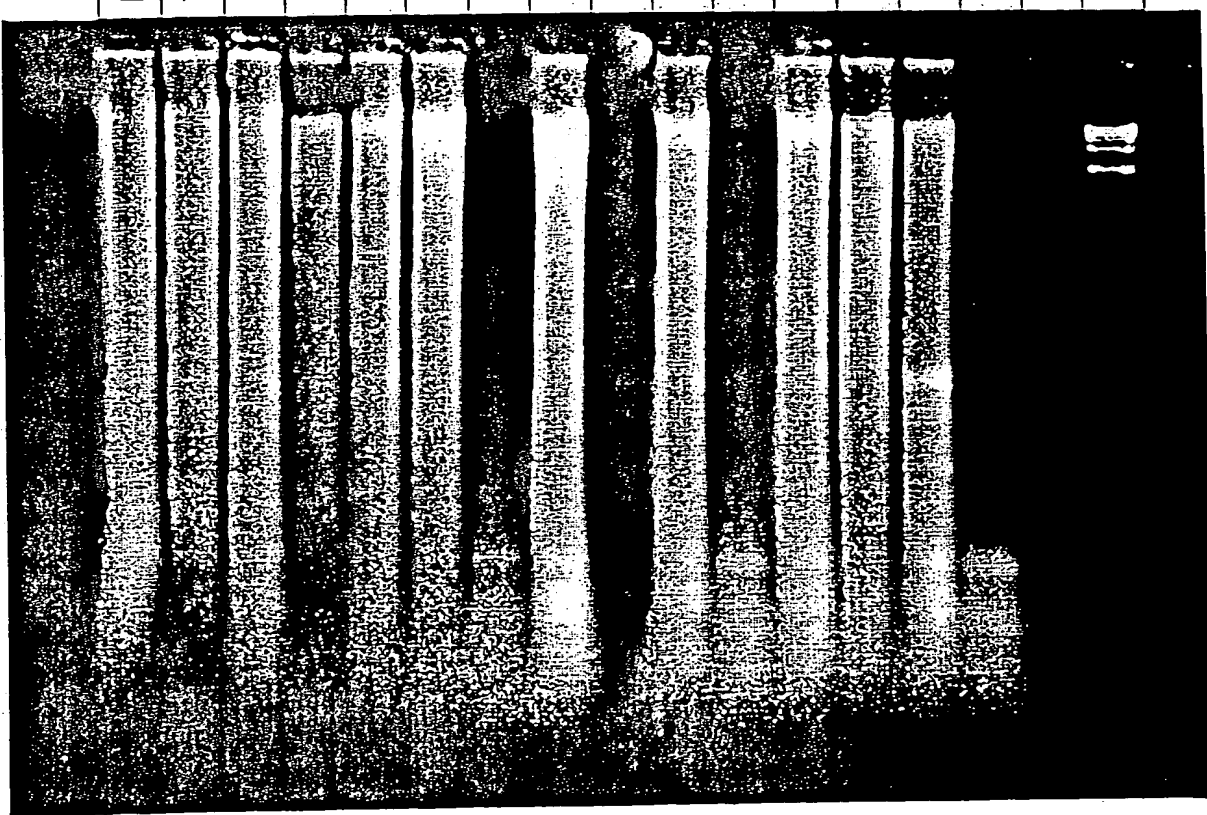


Figure 11



Dodecyltrimethylammonium bromide
Tetradecyltrimethylammonium bromide
Cetyltrimethylammonium bromide
Cetyltrimethylammonium chloride
Hexadecyltrimethylammonium bromide
Hexadecyltrimethylammonium bromide
Mackernium 006 (Polyquaternium 6)
Mackernium KP (Olealkonium chloride)
Mackernium NLE (Quaternium-84)
Mackernium 007 (Polyquaternium-7)
Mackernium Stearalkonium SDC85 Chloride
Benzalkonium chloride
SDS
Nothing



Figure 12

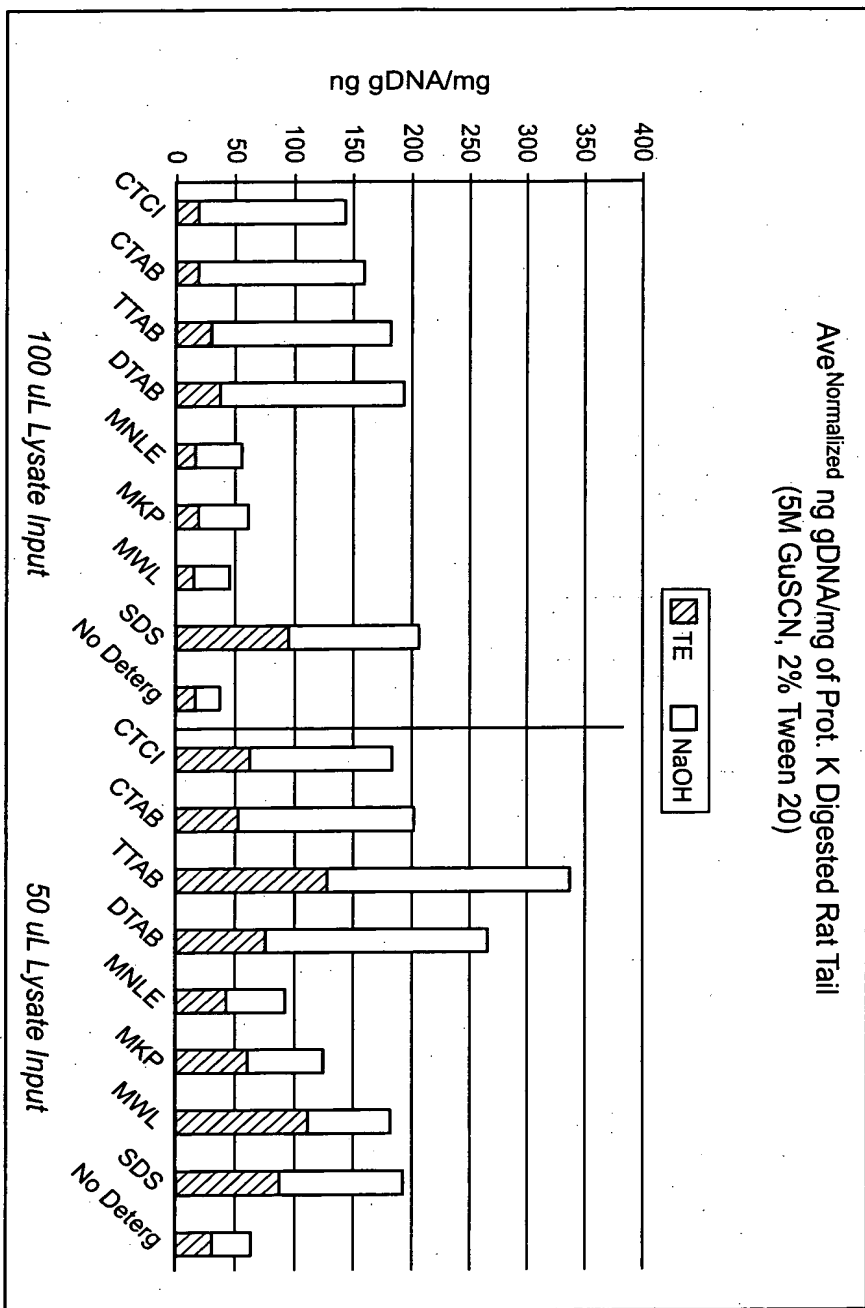


Figure 13

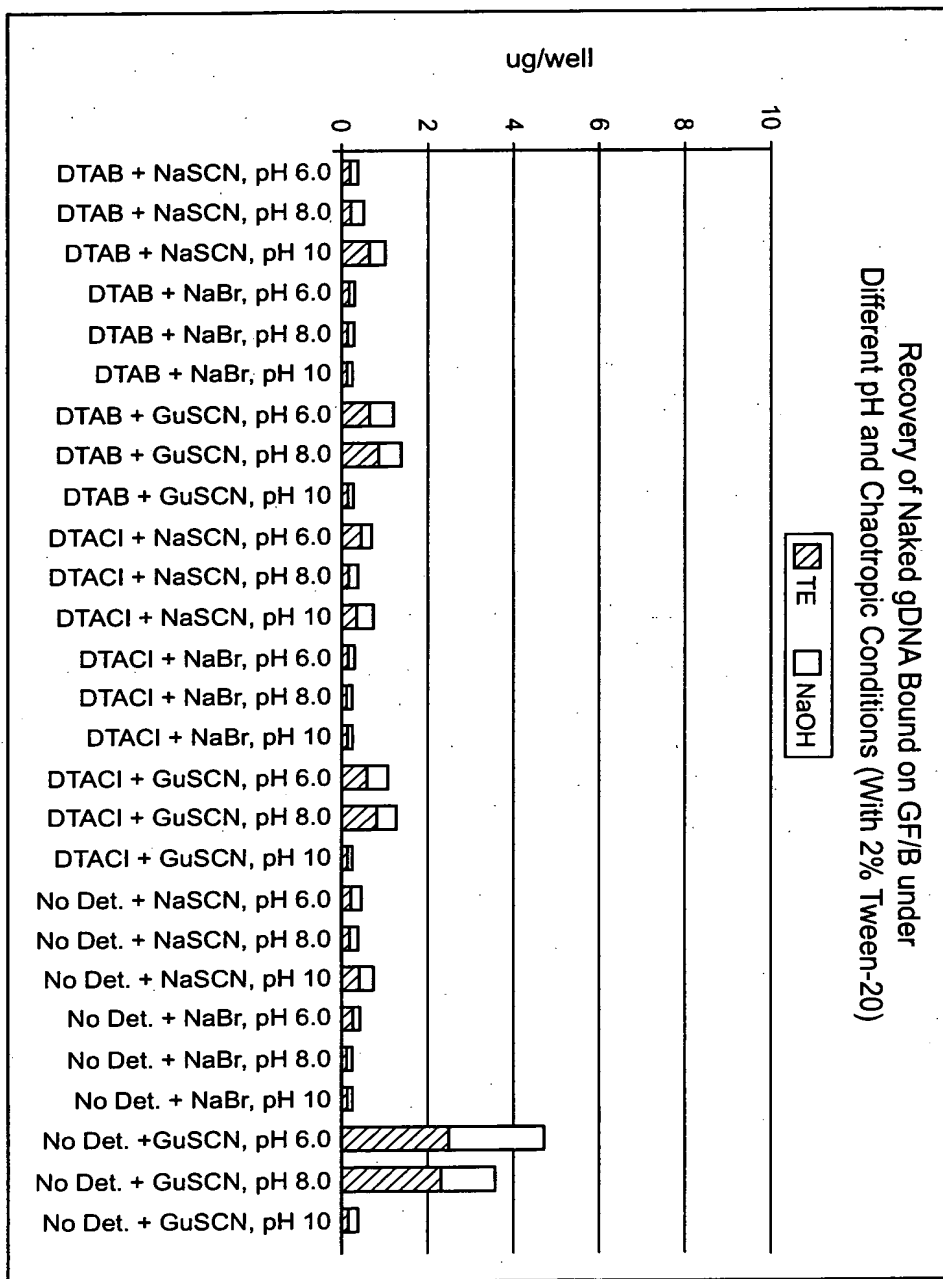


Figure 14

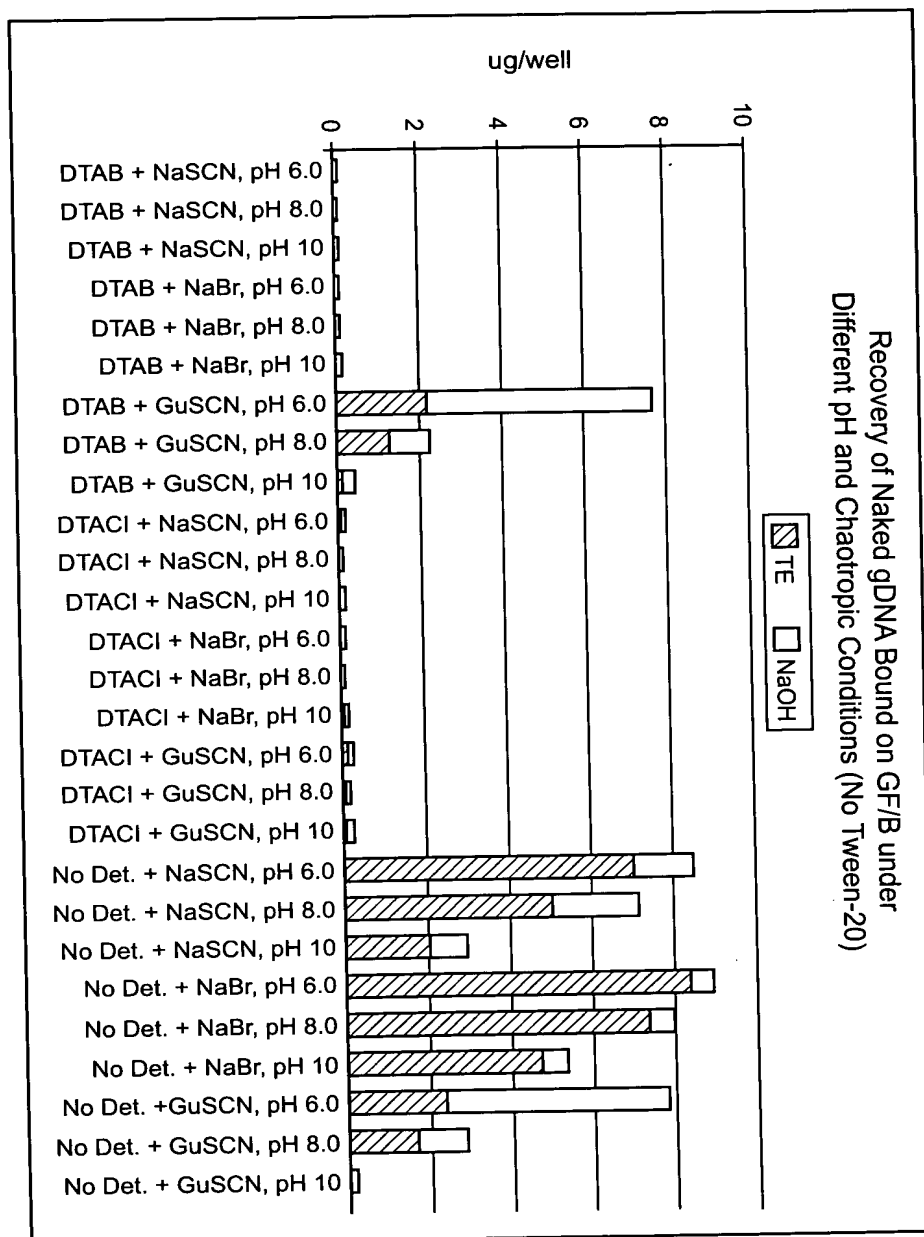


Figure 15

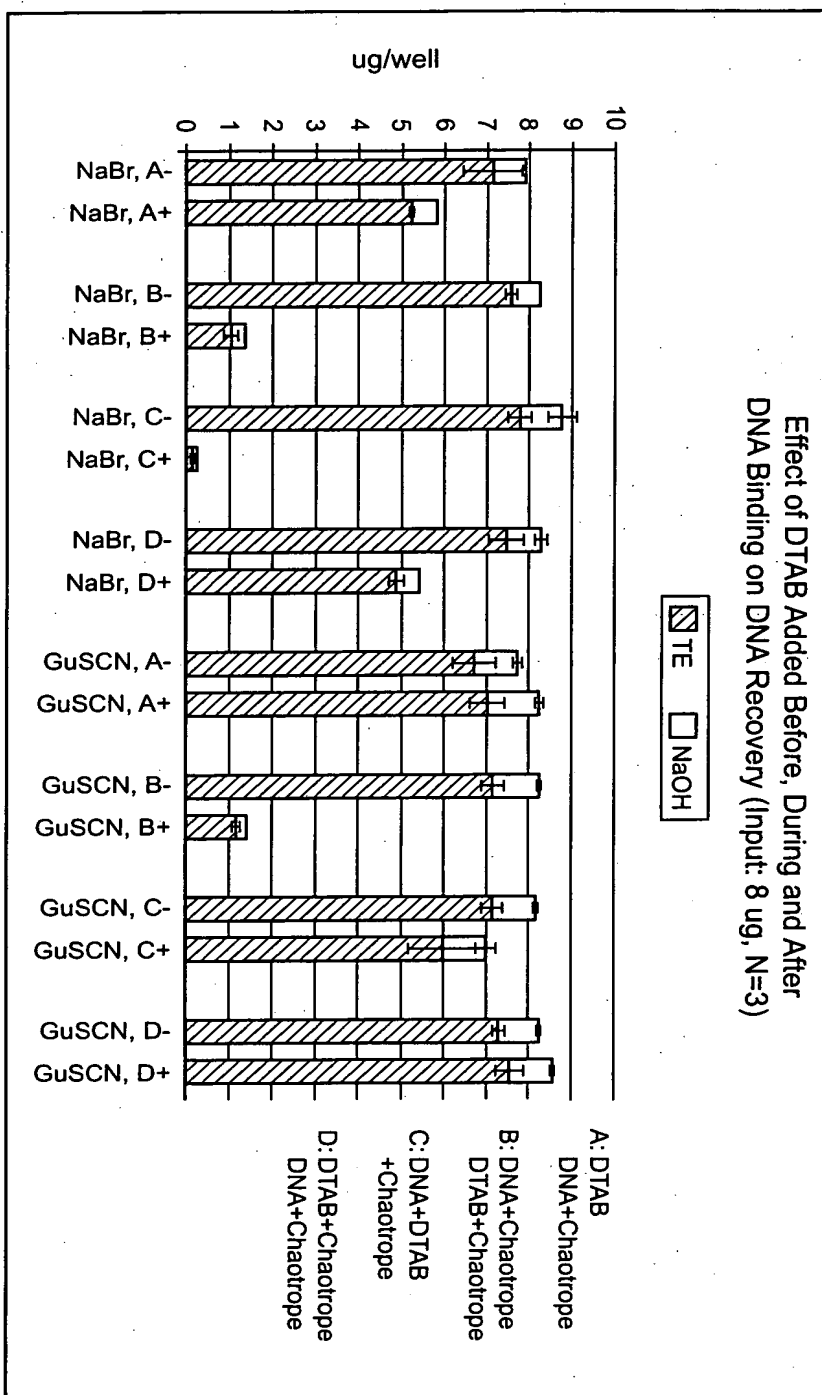


Figure 16

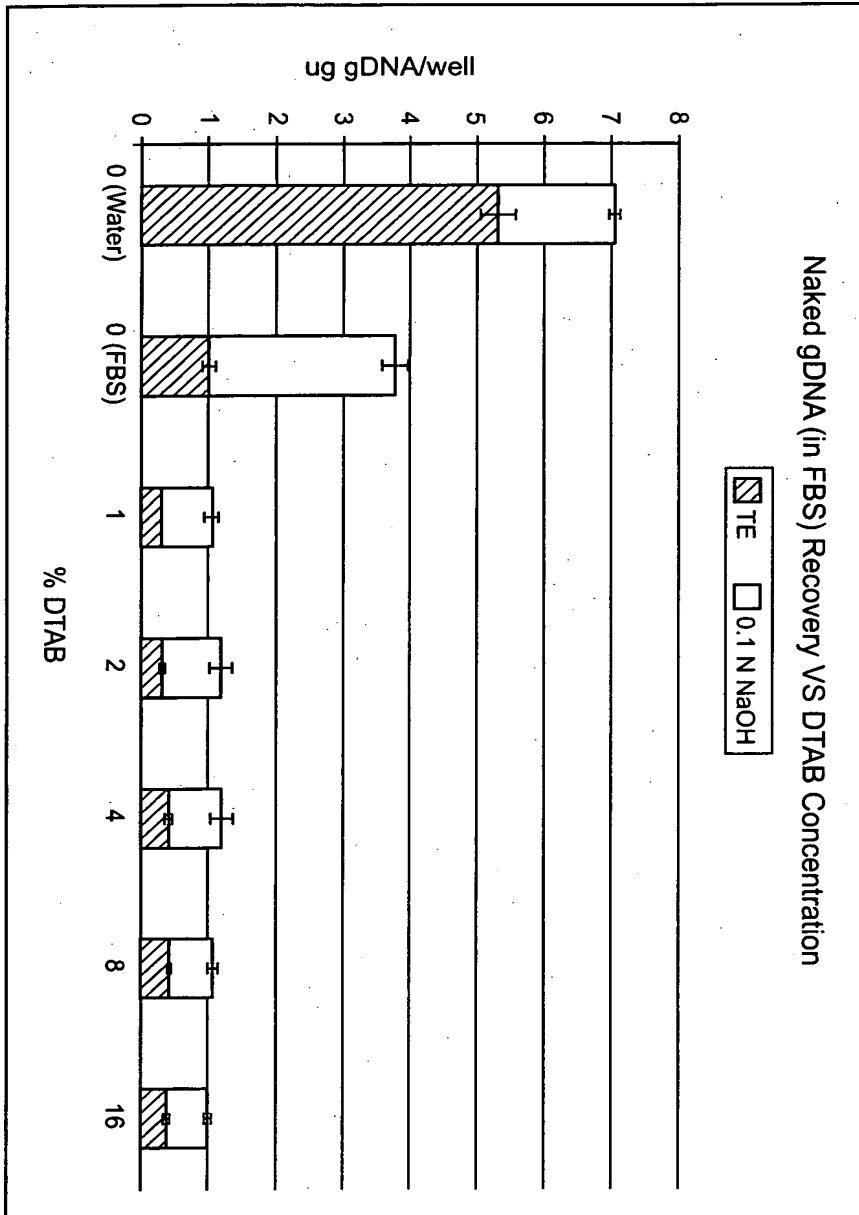


Figure 17

+

+

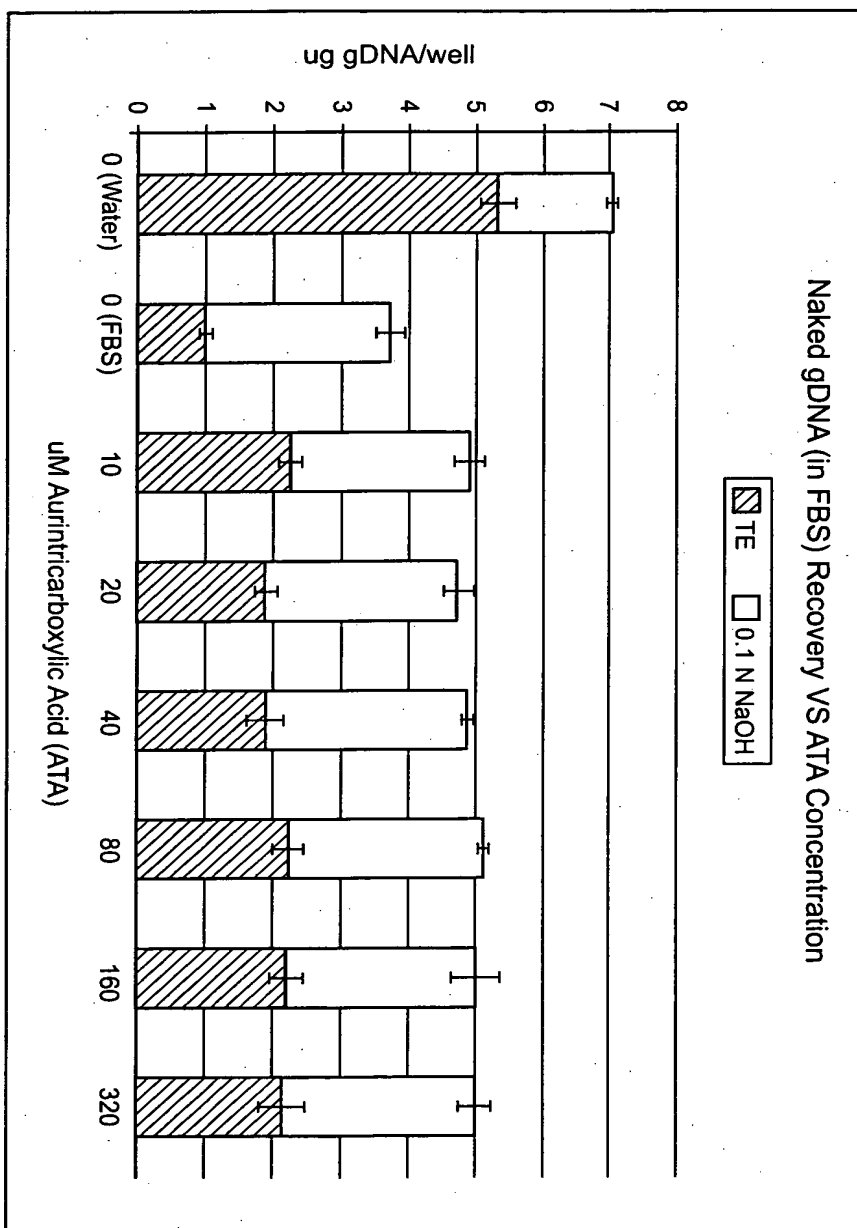


Figure 18

+

+

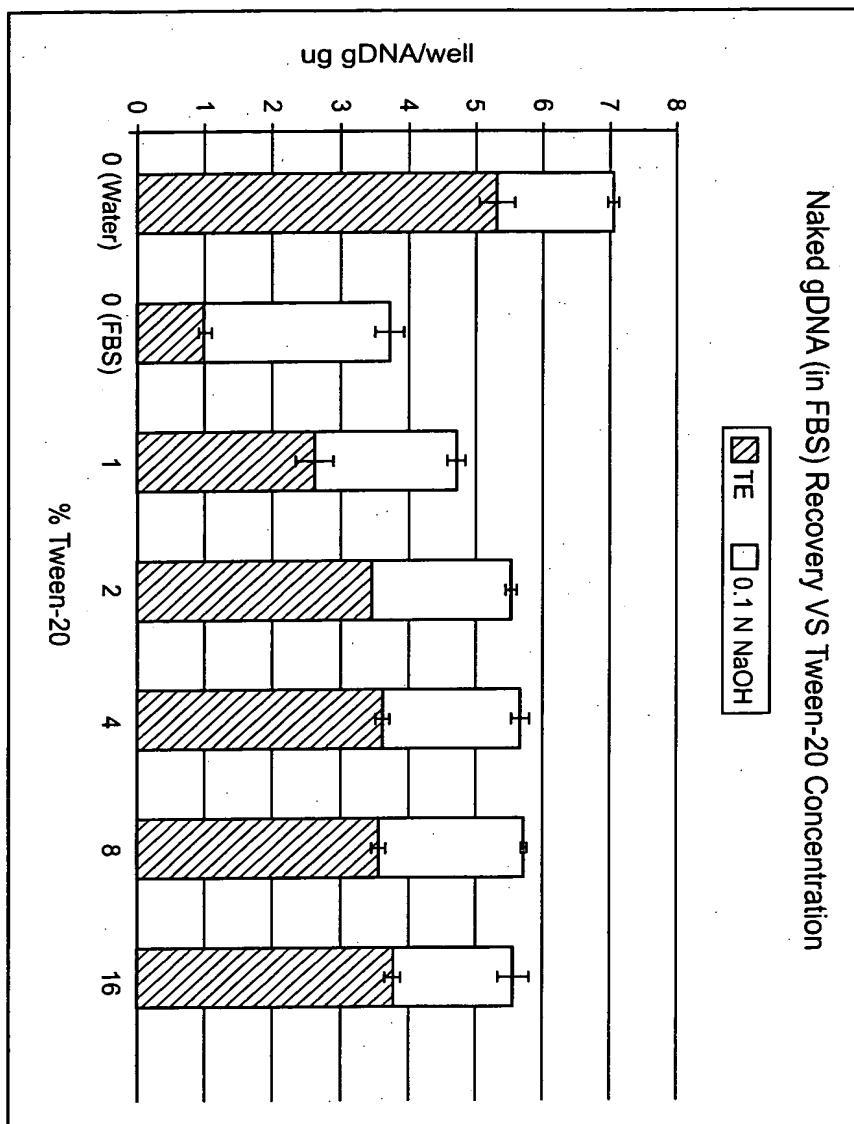


Figure 19

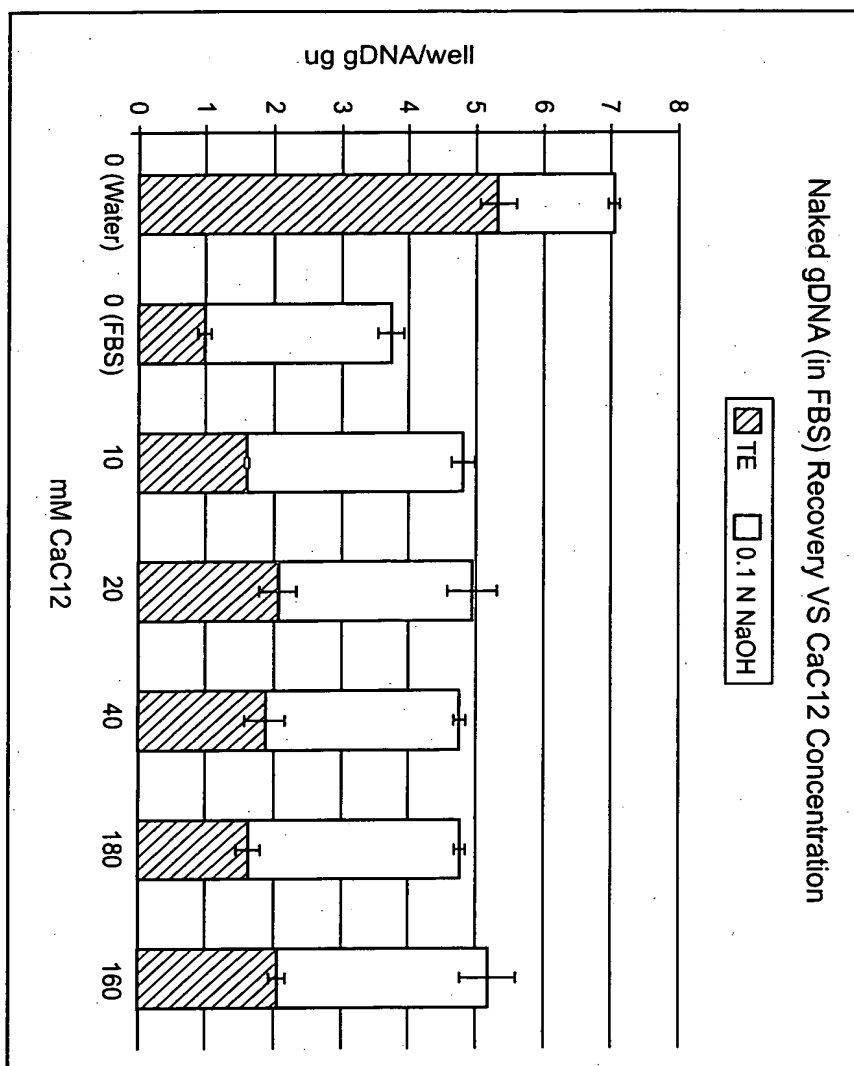


Figure 20

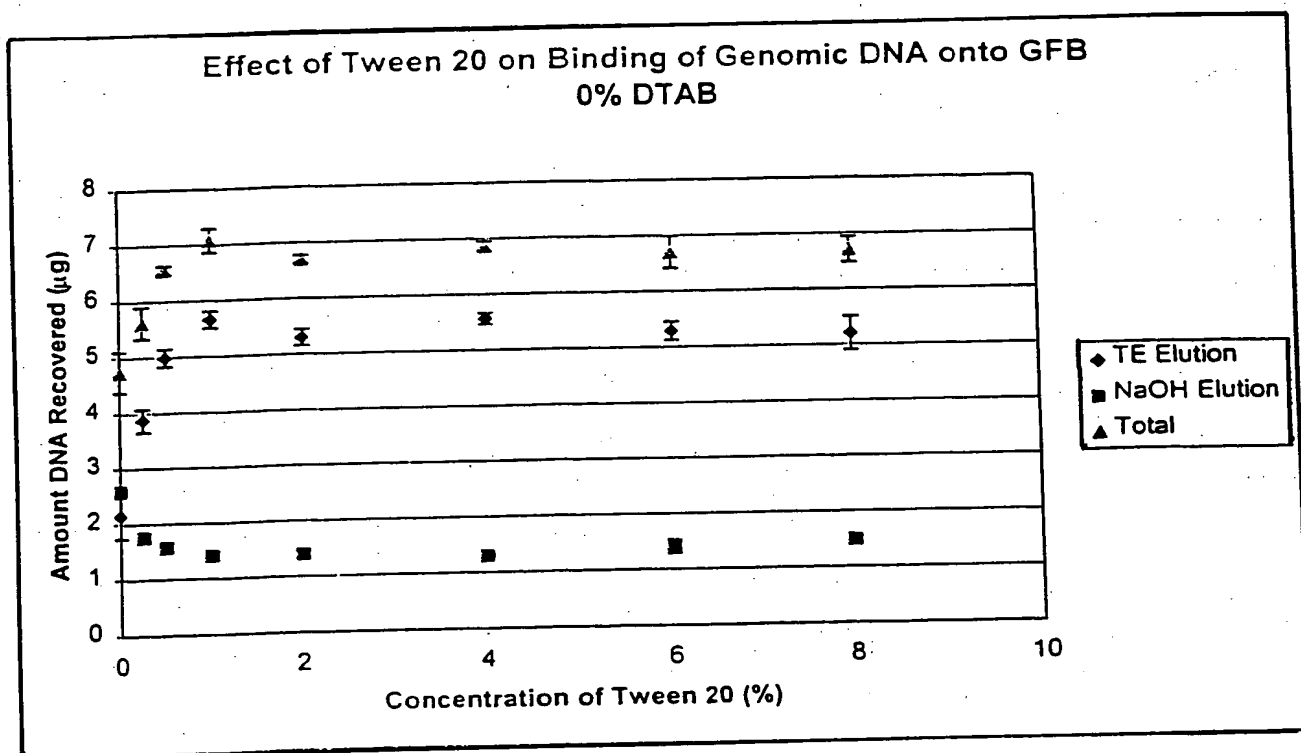


Figure 21

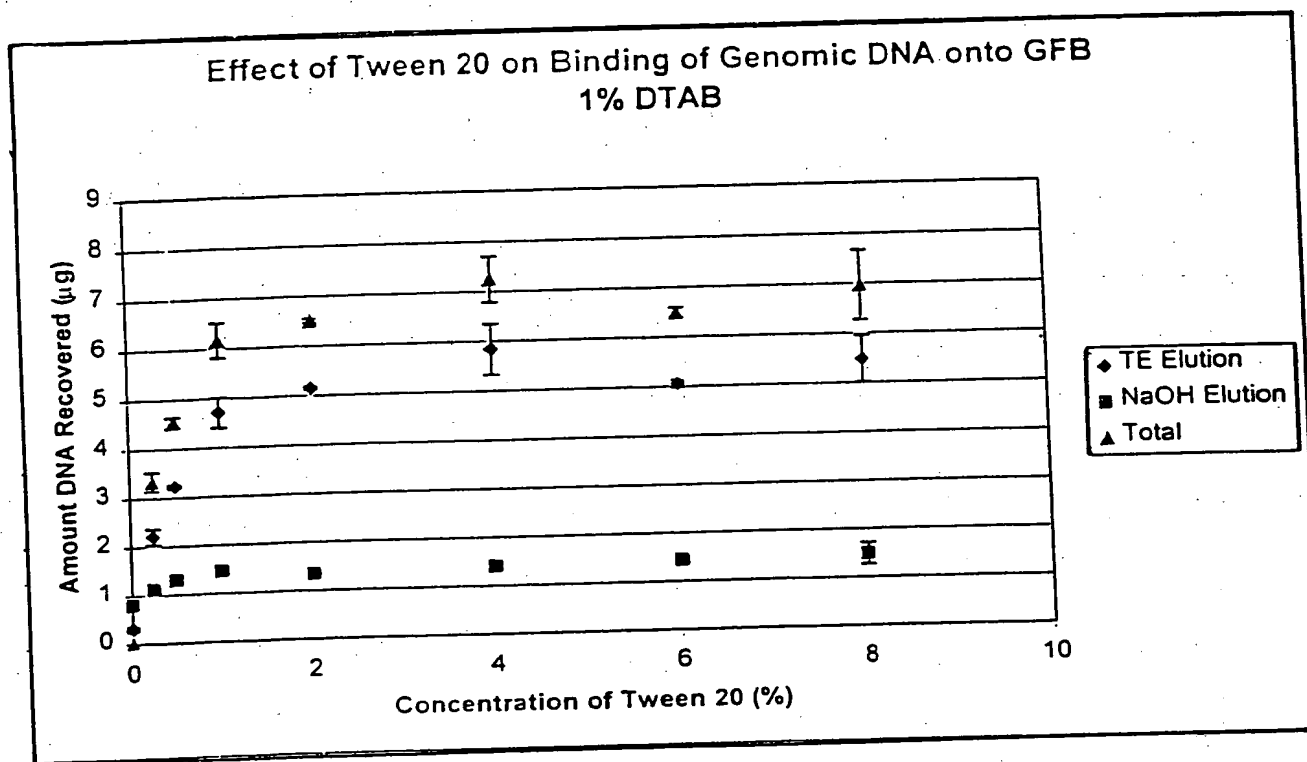


Figure 22

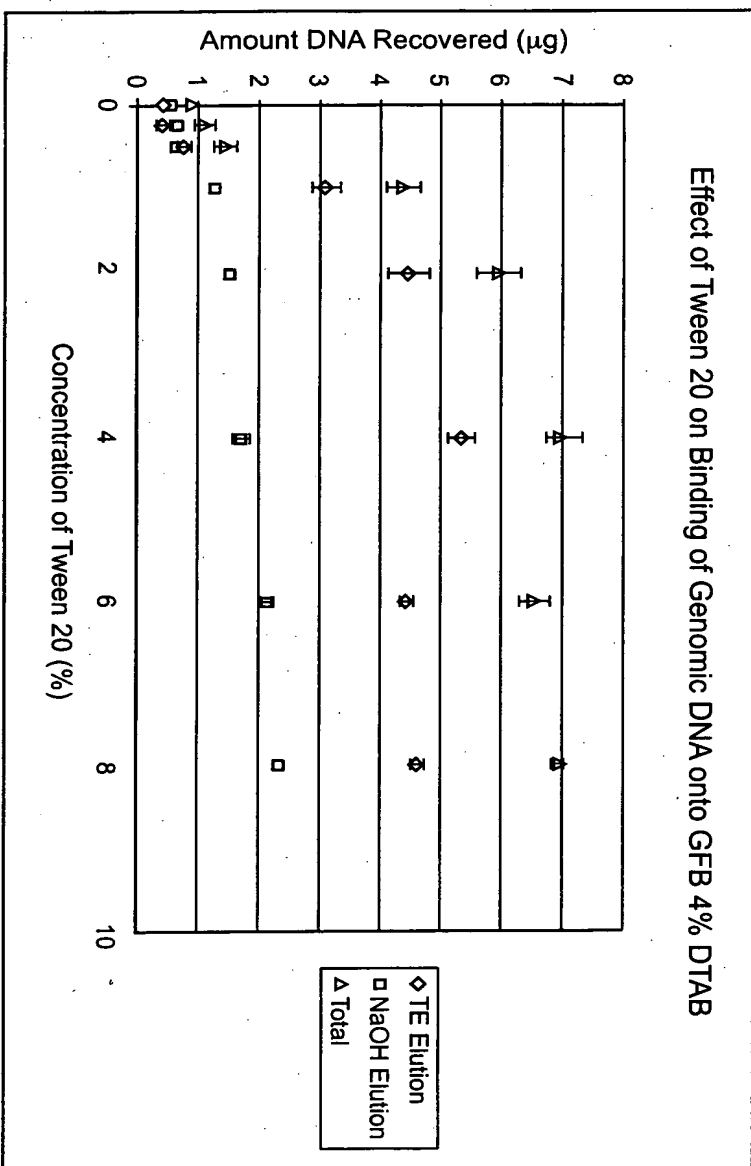


Figure 23

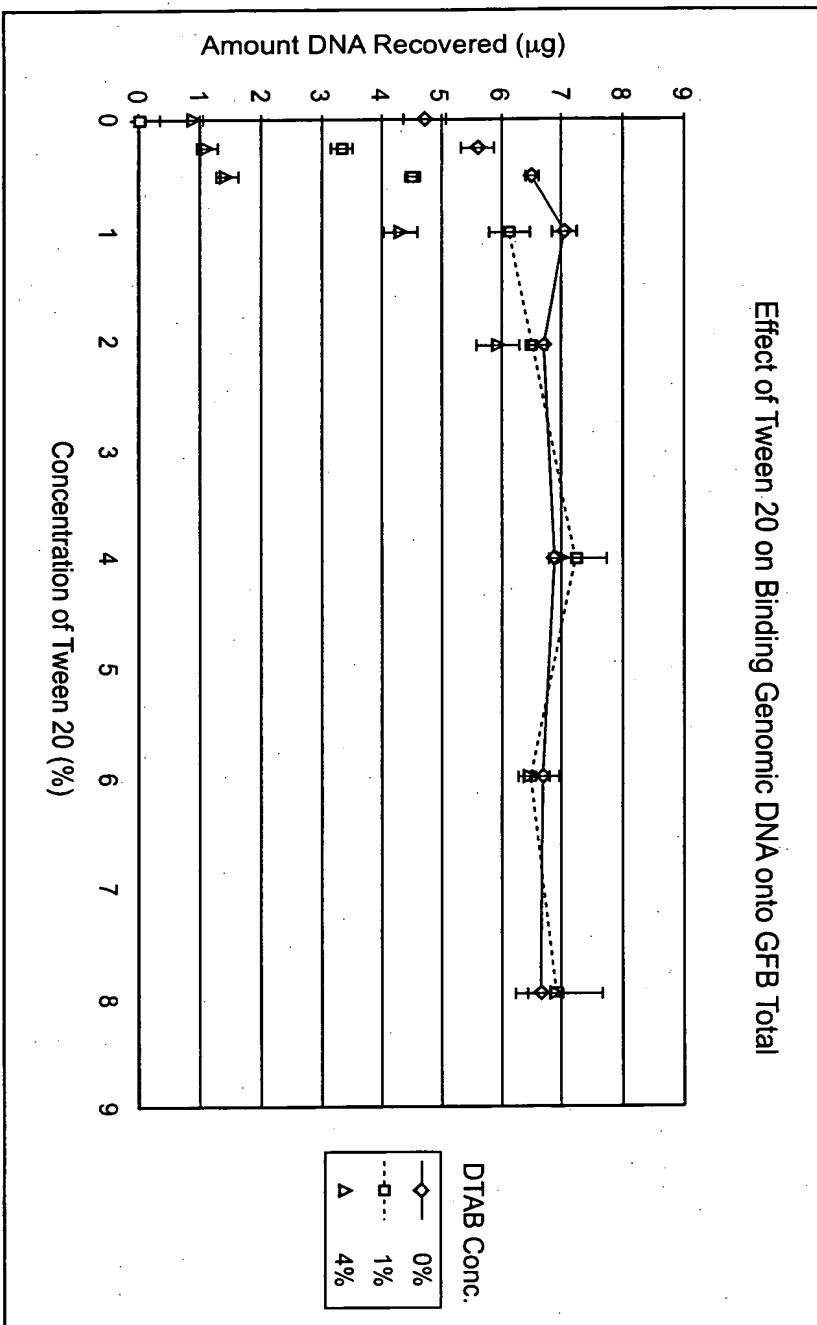


Figure 24

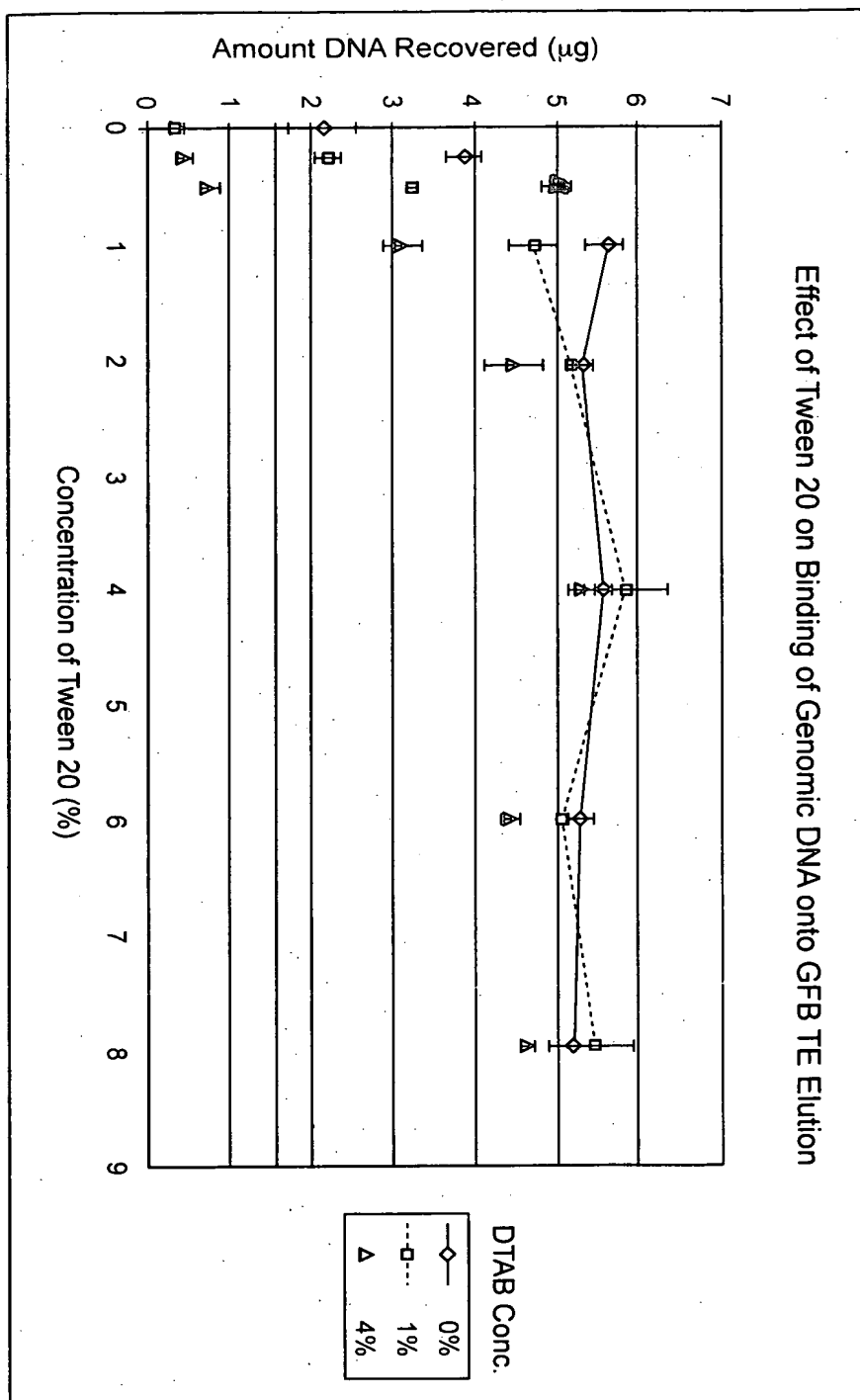


Figure 25

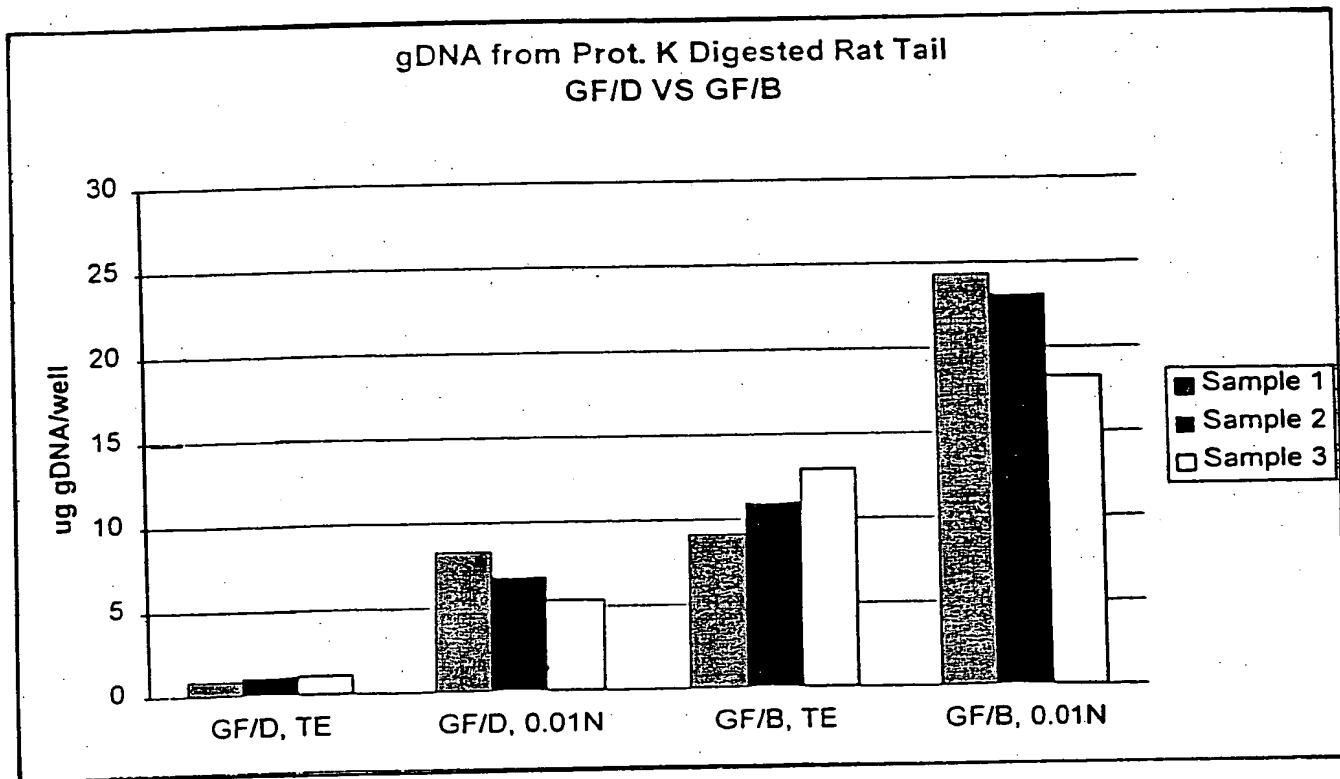


Figure 26

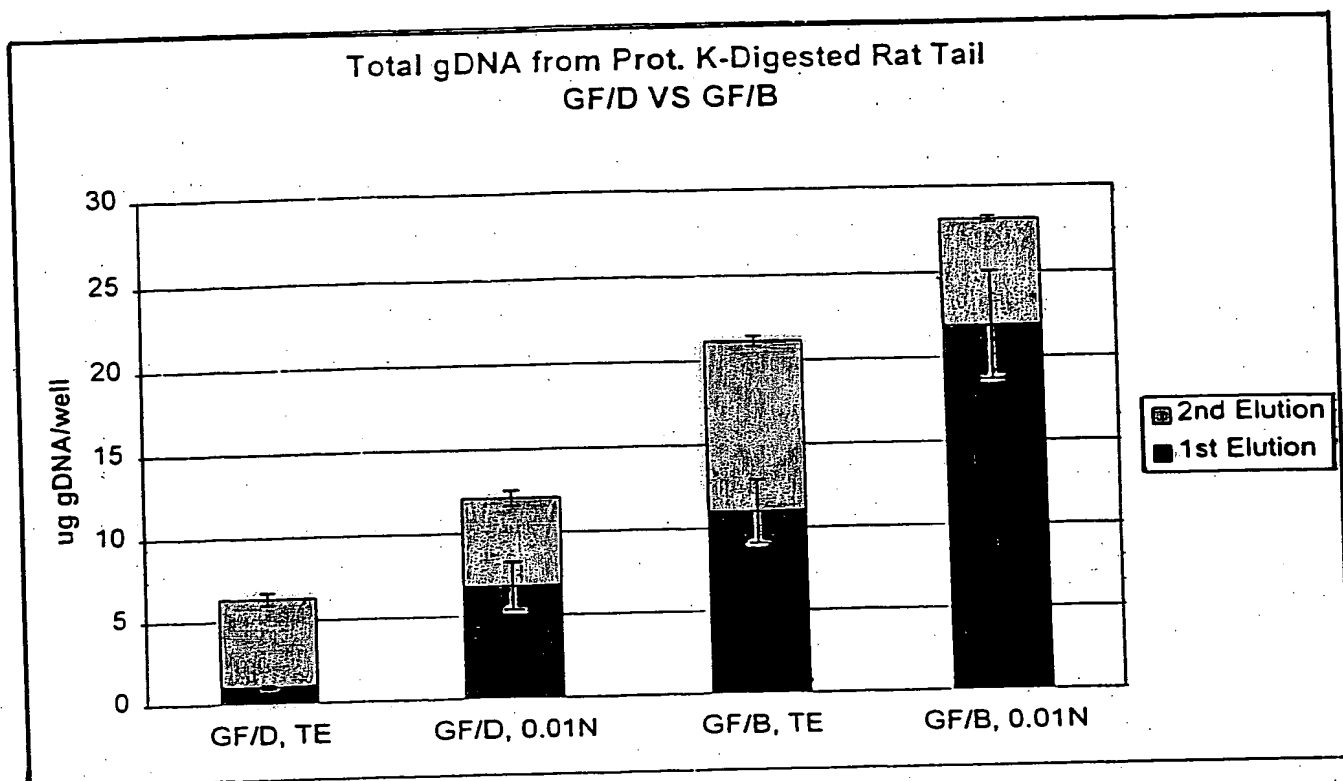
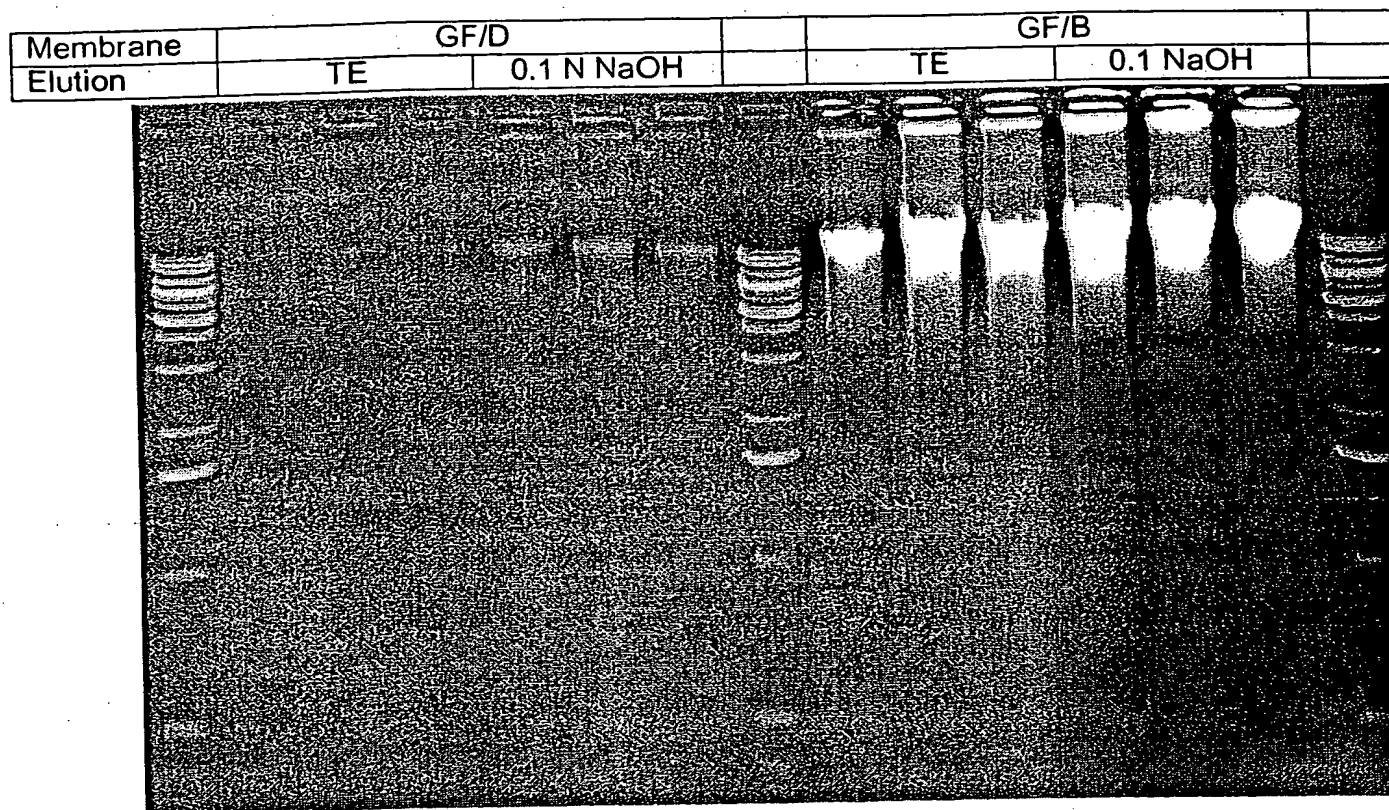


Figure 27



Genomic DNA from 50 mg rat tail sections digested with 1 mg of Prot. K & 1% DTAB and bound onto GF/B and GF/D membranes under 3.75 M GuSCN and 4.5 % Tween 20. The gDNA was finally eluted with of 150 mL of 1X TE and 0.01 N NaOH solutions and 20 mL was used for gel electrophoresis (1 % agarose).

Figure 28

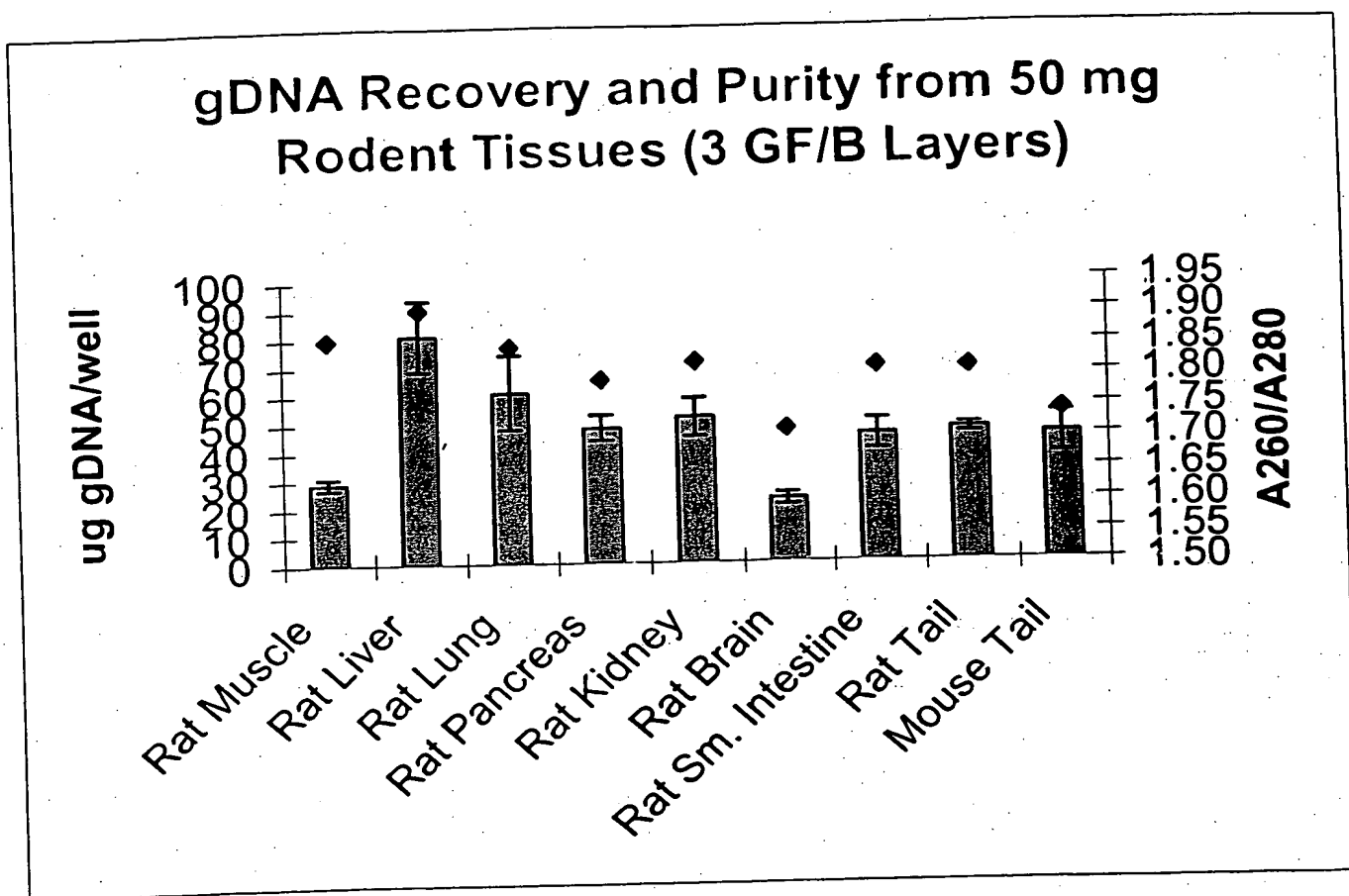
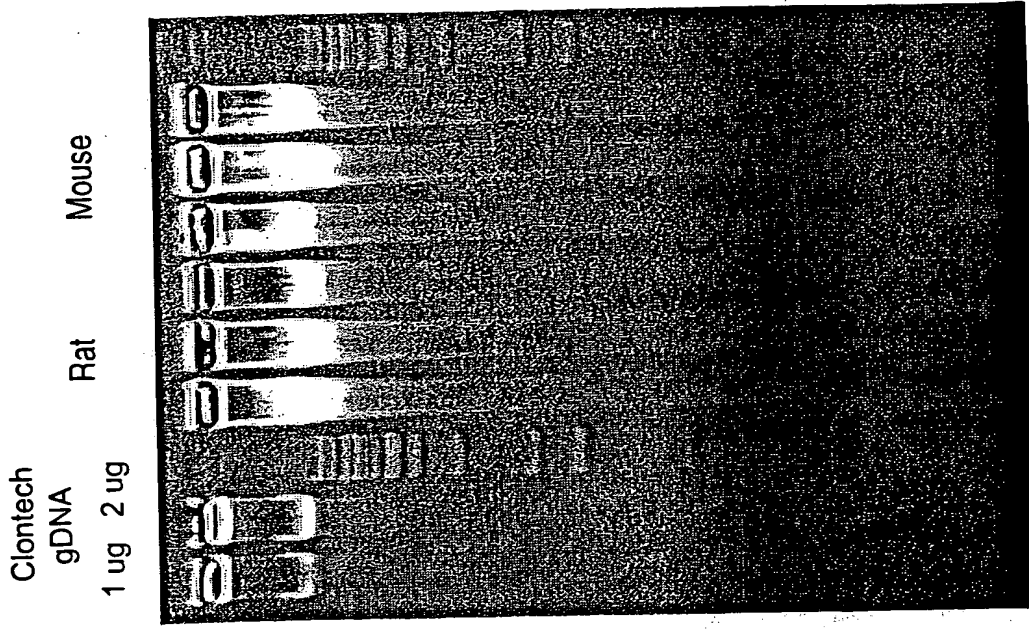
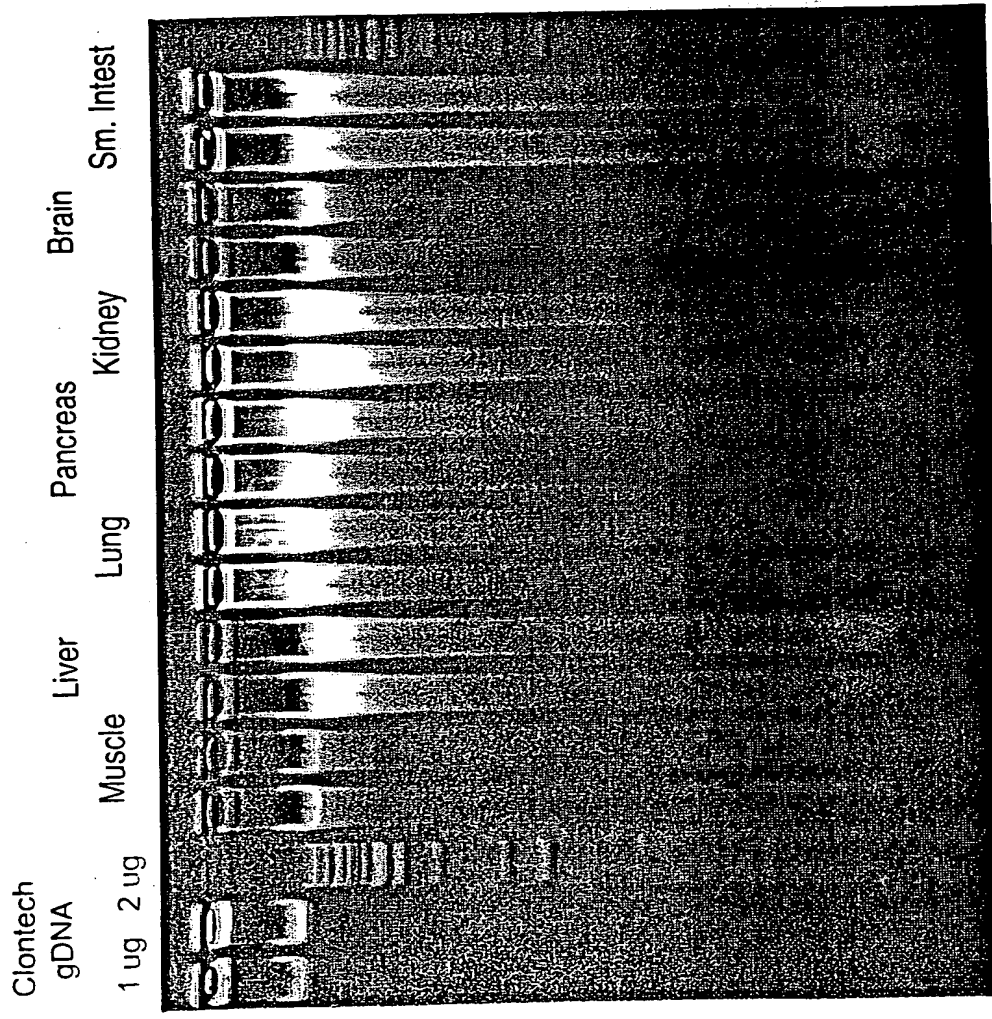


Figure 29

gDNA fr. 50 mg Rodent Tails



gDNA from 50 mg Rat Tissues



Loaded 10 uL per well out of 200 uL Eluate

Figure 30